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—SPACE SHUTTLE—

**AERODYNAMIC CHARACTERISTICS
OF VARIOUS MDAC SPACE
SHUTTLE ASCENT CONFIGUR-
ATIONS WITH PARALLEL BURN
PRESSURE-FED AND SRM BOOSTERS**

**VOLUME III
TANK T4 CONFIGURATIONS**

by

T. W. Jarrett, MDAC

**MDAC 4-FOOT TRISONIC
WIND TUNNEL**



SADSAC SPACE SHUTTLE
AEROTHERMODYNAMIC
DATA MANAGEMENT SYSTEM

CONTRACT NAS8-4016
MARSHALL SPACE FLIGHT CENTER



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SADSAC/SPACE SHUTTLE
WIND TUNNEL TEST DATA REPORT

CONFIGURATION: MDAC Pressure Fed and SRM Parallel Burn Ascent Configurations
TEST PURPOSE: To Define the Aerodynamic Characteristics of an Ascent
Configuration, the Individual Component Contribution,
Relative Orbiter and Booster Position and Interference Effects
TEST FACILITY: MDAC Aerophysics Lab, 4 Foot Trisonic Wind Tunnel
TESTING AGENCY: MDAC (W)
TEST NO. & DATE: S-222; 2 Dec. 1971 - 18 Jan. 1972, 25 Jan. 1972 - 8 Feb. 1972
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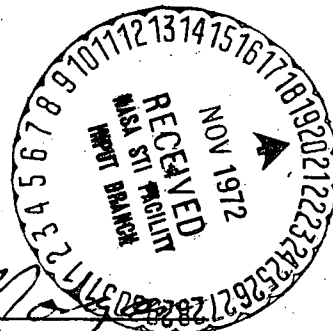
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AERODYNAMIC CHARACTERISTICS OF VARIOUS MDAC SPACE SHUTTLE

ASCENT CONFIGURATIONS WITH PARALLEL BURN PRESSURE-FED

AND SRM BOOSTERS ($M = 0.4 - 4.5$)

By

T. W. Jarrett

INTRODUCTION

Various space shuttle ascent configurations were tested in the MDAC Aerophysics 4 x 4 Ft. Trisonic Wind Tunnel. The models were 0.6 percent scale. The ascent configurations consisted of a NASA/MSO 040A orbiter in combination with various HO centerline tank and booster geometries. The purposes of the tests were to determine the aerodynamics of the ascent configurations, the aerodynamic interference between components and its effect on orbiter aerodynamics, and to determine orbiter aileron effectiveness.

The model was sting mounted with either a single internal balance (in the orbiter HO tank) or dual internal balances (one in the orbiter and one in the orbiter HO tank). With the dual balance setup, three types of runs were made; one with tank alone on the tank balance, one with tank and two attached boosters on the tank balance, and one with the tank and one booster attached on the tank balance and the other booster isolated on a separate sting but in proximity to the tank and orbiter. In addition to the 6-component force and moment balance data, base pressure data were taken for the boosters, the tank and the orbiter. Angle of attack data included α sweeps at 0° and 6° β (the latter involving a knuckle change) and β sweeps at 0° and 6° α . Through the use of a remote roll device it was usually possible to get both an α sweep and a β sweep in a single run.

INTRODUCTION (Continued)

The report consists of five volumes arranged in the following manner:

- | | |
|------------|---|
| Volume I | Ascent configurations with centerline HO tanks T_1 and T_2 |
| Volume II | Ascent configurations with centerline HO tank T_3 |
| Volume III | Ascent configurations with centerline HO tank T_4 |
| Volume IV | Ascent configuration plume studies and configuration buildup |
| Volume V | Orbiter alone, Tanks alone and Boosters alone |

NOMENCLATURE
General

| <u>SYMBOL</u> | <u>SADSAC SYMBOL</u> | <u>DEFINITION</u> |
|----------------|--------------------------|--|
| a | | speed of sound; m/sec, ft/sec |
| C _p | CP | pressure coefficient; $(p_1 - p_\infty)/q$ |
| M | MACH | Mach number; V/a |
| p | | pressure; N/m ² , psf |
| q | Q(NSM) Q(PSF) | dynamic pressure; $1/2\rho V^2$, N/m ² , psf |
| RN/L | RN/L | unit Reynolds number; per m, per ft |
| V | | velocity; m/sec, ft/sec |
| α | ALPHA | angle of attack, degrees |
| β | BETA | angle of sideslip, degrees |
| ψ | PSI | angle of yaw, degrees |
| ϕ | PHI | angle of roll, degrees |
| ρ | | mass density; kg/m ³ , slugs/ft ³ |

Reference & C.G. Definitions

| | | |
|------------------------------|------|---|
| A _b | | base area; m ² , ft ² |
| b | BREF | wing span or reference span; m, ft |
| c.g. | | center of gravity |
| \bar{L}_{REF} \bar{c} | LREF | reference length or wing mean aerodynamic chord; m, ft |
| S | SREF | wing area or reference area; m ² , ft ² |
| | MRP | moment reference point |
| | XMRP | moment reference point on X axis |
| | YMRP | moment reference point on Y axis |
| | ZMRP | moment reference point on Z axis |

SUBSCRIPTS

| | |
|----------|-------------------|
| b | base |
| l | local |
| s | static conditions |
| t | total conditions |
| ∞ | free stream |

NOMENCLATURE (Continued)

Body-Axis System

| <u>SYMBOL</u> | <u>SADSAC SYMBOL</u> | <u>DEFINITION</u> |
|---------------|--------------------------|---|
| C_N | CN | normal-force coefficient; $\frac{\text{normal force}}{qS}$ |
| C_A | CA | axial-force coefficient; $\frac{\text{axial force}}{qS}$ |
| C_Y | CY | side-force coefficient; $\frac{\text{side force}}{qS}$ |
| C_{A_b} | CAB | base-force coefficient; $\frac{\text{base force}}{qS}$ $-A_b(p_b - p_\infty)/qS$ |
| C_{A_f} | CAF | forebody axial force coefficient, $C_A - C_{A_b}$ |
| C_m | CLM | pitching-moment coefficient; $\frac{\text{pitching moment}}{qS_{REF}}$ |
| C_n | CYN | yawing-moment coefficient; $\frac{\text{yawing moment}}{qS_b}$ |
| C_l | CBL | rolling-moment coefficient; $\frac{\text{rolling moment}}{qS_b}$ |

Stability-Axis System

| | | |
|-----------|-----|--|
| C_L | CL | lift coefficient; $\frac{\text{lift}}{qS}$ |
| C_D | CD | drag coefficient; $\frac{\text{drag}}{qS}$ |
| C_{D_b} | CDB | base-drag coefficient; $\frac{\text{base drag}}{qS}$ |
| C_{D_f} | CDF | forebody drag coefficient; $C_D - C_{D_b}$ |
| C_Y | CY | side-force coefficient; $\frac{\text{side force}}{qS}$ |
| C_m | CLM | pitching-moment coefficient; $\frac{\text{pitching moment}}{qS_{REF}}$ |
| C_n | CLN | yawing-moment coefficient; $\frac{\text{yawing moment}}{qS_b}$ |
| C_l | CSL | rolling-moment coefficient; $\frac{\text{rolling moment}}{qS_b}$ |
| L/D | L/D | lift-to-drag ratio; C_L/C_D |

ADDITIONS TO NOMENCLATURE

| <u>SYMBOL</u> | <u>SADSAC SYMBOL</u> | <u>DEFINITION</u> |
|---------------|--------------------------|---|
| C_L^2 | CLSQR | lift coefficient squared. |
| δ_a | AILRON | aileron, total aileron deflection angle, degrees, (left aileron-right aileron)/2. |
| δ_e | ELEVON | elevon, surface deflection angle, positive deflection, trailing edge down; degrees. |
| δ_r | RUDDER | rudder, surface deflection angle, positive deflection, trailing edge to the left; degrees |
| δ_{rf} | RUDFLR | rudder flare, split rudder deflection angle, left split rudder trailing edge left and right split rudder trailing edge right, $\delta_{rf} = (\delta_{rL} + \delta_{rR})/2$, positive deflection; degrees. |

CONFIGURATIONS INVESTIGATED

The wind tunnel models were 0.6 percent scale models and included one orbiter configuration, four tank configurations, and seven booster configurations. The orbiter centerline H₂O propellant tanks included variations in diameter (302 and 325 in.), nose cone angle (10° and 15°), and axial position (120 inch travel). Of the boosters, three were solid rocket motors with the remainder being pressure fed boosters. The pressure fed boosters included variations in diameter (206 and 248 inch), nose cone angle (15° and 20°) and base flare (5° and 15°). The solid rocket motors included variations in diameter (156 and 120 in.) and base flare (0° and 15°) for the 156 in. motor.

In addition, simulated rocket plumes were tested at $M = 1.5$ and 2.2 for both pressure fed and solid rocket motor boosters. These plumes were made up of three solid aluminum bodies each of which represented an envelope of individual engine plumes for the orbiter and each booster. These envelopes were generated by taking the outermost plume boundary of the outermost engine for each component and rotating this boundary about the null thrust vector of the component (orbiter or booster). The individual engine plumes were generated at MSC with the plume boundary defined by a method of characteristics solution with the flow field originating at the exit plane, and the effects of the external flow on the boundary calculated by Newtonian impact theory.

The contours of the various plumes tested are defined in Table 4 and Figure 43 through 46. The matrix of plume testing was as follows:

| <u>CONFIGURATION</u> | <u>BOOSTER PLUME</u> | <u>ORBITER PLUME</u> | <u>M_{TEST}</u> |
|--|----------------------|----------------------|-------------------------|
| O ₁ T ₁ B ₁ | LOX/PROP M = 2.5 | 4 ENG. J2S M = 2.5 | 2.2 |
| O ₁ T ₁ B ₁ | LOX/PROP M = 1.5 | 3 ENG. HiPc M = 1.5 | 1.5 |
| O ₁ T ₁ B ₁ | LOX/PROP M = 1.5 | 3 ENG. HiPc M = 1.5 | 2.2 |
| O ₁ T ₃ B ₆ | 156" SRM M = 1.5 | 3 ENG. HiPc M = 1.5 | 1.5 |
| O ₁ T ₃ B ₆ | 156" SRM M = 2.2 | 3 ENG. HiPc M = 2.2 | 2.2 |
| O ₁ T ₄ B ₇ A ₁ -4 | 120" SRM M = 1.5 | 3 ENG. HiPc M = 1.5 | 1.5 |
| O ₁ T ₄ B ₇ A ₁ -4 | 120" SRM M = 2.2 | 3 ENG. HiPc M = 2.2 | 2.2 |

Symbols for Orbiter Configuration:

| <u>Symbol</u> | <u>Description</u> |
|------------------|-------------------------------------|
| O1 | W1B1E1V2R2P1M1C0 |
| W1 | Wing |
| B1 | Body |
| E1 | Elevon |
| V1 | Centerline vertical (Replaces V2R2) |
| V2 | Centerline vertical |
| V _{OFF} | No centerline vertical |
| C0 | Canopy |
| R1 | Rudder for V1 |
| R2 | Rudder for V2 |
| P1 | ACPS Engine Pod |
| M1 | OMS Engine Pod |
| C1 | Cupola |
| C2 | Canopy Off (Replaces C0) |

Symbols for Tanks

| <u>Symbol</u> | <u>Description</u> |
|--------------------|---|
| T () | Tank complete |
| T () _a | Tank complete at an alternate position with respect to the boosters and orbiter |
| F1 | Fin for T ₄ |

Symbols for Boosters:

| <u>Symbol</u> | <u>Description</u> |
|----------------|---|
| B () | Boosters complete |
| S | Skirt for booster |
| F ₄ | Fins for B ₄ |
| A | Thrust vectoring fuel tank for B ₇ |

Symbols for Plumes:

| <u>Symbol</u> | <u>Description</u> |
|---------------|--|
| + Plume (2.5) | 3 Plumes (Orbiter + 2 Boosters) at M = 2.5 |
| + Plume (1.5) | 3 Plumes (Orbiter + 2 Boosters) at M = 1.5 |
| + Plume (2.2) | 3 Plumes (Orbiter + 2 Boosters) at M = 2.2 |

TEST FACILITY

The MDAL 4' Trisonic Wind Tunnel facility is a blowdown type operation capable of Mach numbers of 0.2 to 5.0 and Reynolds numbers from approximately 1×10^6 to 2×10^6 per inch. The subsonic and transonic Mach numbers are run in a porous wall test section which is removed for supersonic testing. The supersonic test section utilizes a two dimensional flexible plate nozzle to obtain Mach numbers 1.5 to 5.0. The models are mounted on a sting that is supported from a vertical translating strut with a vertical plane rotating pod having a pitch range of -15° to $+25^\circ$ when no offset adapters are present.

MODELS AND SUPPORT EQUIPMENT

The test models with all of their interchangeable component parts were 0.60 percent of full scale.

The orbiter model had a blended body contoured into a low delta wing. Effects of orbiter position and booster relative to the tank was investigated at two longitudinal locations on the tank (nominal and aft). The orbiter and boosters can be bolted to the tank (T1) in both nominal and aft positions as well as independently mounted from the tank. For the bolted orbiter case, the orbiter balance was inoperative and there were no force or moment data for the orbiter.

Effects of the orbiter control surfaces and control surface deflections were investigated for elevons, ailerons, and rudder with the surfaces deflected and undeflected.

Transition strips of No. 120 carborundum grit were used to insure boundary layer transition from laminar to turbulent flow. These strips were $3/32$ inches wide and were located $3/4$ inches aft of the orbiter nose, $1/2$ inch aft of the booster nose, $1/2$ inch aft of the tank nose, and at 5 percent local chord (both surfaces) on the wings, vertical tails and fins.

To achieve the required test angles of attack and sideslip two straight balance adapters were used in combination with the MDAL 6 degree sting adapter. A straight sting section positioned the model properly in the test section.

Pressure data for the orbiter, tank or the booster were obtained from base and balance cavity pressure pickups that were cantilevered off the sting. Leads for these pickups were routed externally over the model support system and into the tunnel strut. The boosters in the presence of the tank each had a base pressure pickup.

DATA REDUCTION

The data are corrected for such factors as model tares, sting bending and balance deflections, interactions, and bilinearities.

Composite Configurations

1. The orbiter data were reduced about the orbiter MRP using its reference dimensions and about the tank MRP, using orbiter reference dimensions (\bar{c} for longitudinal and b for lateral).
2. The tank data were reduced about the tank MRP using orbiter reference dimensions (\bar{c} for longitudinal and b for lateral).
3. A summation of the orbiter (tank MRP) and tank (tank MRP) data with all data corrected for angular attitudes to the tank body axes.

Orbiter Alone Configurations

1. The orbiter data were reduced about the orbiter MRP using the orbiter reference dimensions (\bar{c} for longitudinal and b for lateral).

Tank Alone Configurations

1. The tank data were reduced about the tank MRP using the orbiter reference dimensions.

Booster Alone Configurations

1. The booster data were reduced about the booster MRP using the orbiter reference dimensions.

Ascent configuration composite tank MRP data, orbiter alone data, tank alone data and booster alone data are presented in this report, with the remaining data on file and available upon request.

Reference quantities used in these data reductions are as follows:

| ORBITER | | |
|-----------------------------|---|-------------------------|
| <u>Quantity</u> | <u>Full Scale Dimensions (Reference only)</u> | <u>Model Dimensions</u> |
| Reference Area (S) | 3155.3 Ft ² | 16.37 In ² |
| Reference Span (b) | 882 In. | 5.292 In |
| Reference MAC (\bar{c}) | 609.5 In. | 3.657 In |
| Moment Reference Points | | See Figures 13 & 14 |

DATA REDUCTION (CONTINUED)

Areas:

| | | |
|----------------------|-------------------|---------------------|
| Total Base (A_B) | 298 Ft^2 | 1.546 In^2 |
|----------------------|-------------------|---------------------|

TANK

| <u>Quantity</u> | <u>Full Scale Dimensions (Reference only)</u> | <u>Model Dimensions</u> |
|--------------------------------|---|-------------------------|
| Reference Area (S) | 3155.3 Ft^2 | 16.37 in^2 |
| Reference Length (b) | 882 In. | 5.292 in. |
| Reference Length (\bar{c}) | 609.5 In. | 3.657 in. |
| Moment Reference Points | | See Figures 13 & 15 |

Areas:

| | | |
|---------------------------|------------------------|---------------------|
| Total Base (A_B)/Tank | T1 - 422 Ft^2 | 2.125 In^2 |
| | T2 - 422 Ft^2 | 2.125 In^2 |
| | T3 - 518 Ft^2 | 2.613 In^2 |
| | T4 - 537 Ft^2 | 2.785 In^2 |

BOOSTER

| <u>Quantity</u> | <u>Full Scale Dimensions (Reference only)</u> | <u>Model Dimensions</u> |
|--------------------------------|---|--------------------------------|
| Reference Area (S) | 3155.3 ft^2 | 16.37 in^2 |
| Reference Length (b) | 882 in. | 5.292 in. |
| Reference Length (\bar{c}) | 609.5 in. | 3.657 in. |
| Moment Reference Points | | See Figures 13 & 16 through 19 |

DATA REDUCTION (CONTINUED)

Areas:

| | | | | |
|------------------------------|------|---|---------------------|-----------------------|
| Total Base (A_B)/Booster | B1 | - | 901.0 Ft^2 | 4.539 In^2 |
| | B1S1 | - | 2125 Ft^2 | 11.0093 In^2 |
| | B1S2 | - | 4785 Ft^2 | 24.7887 In^2 |
| | B2 | - | 137.8 Ft^2 | 0.694 In^2 |
| | B2S | - | 428 Ft^2 | 2.158 In^2 |
| | B3 | - | 902 Ft^2 | 4.545 In^2 |
| | B4 | - | 568 Ft^2 | 2.865 In^2 |
| | B5 | - | 557 Ft^2 | 2.883 In^2 |
| | B6 | - | 95.4 Ft^2 | 0.481 In^2 |
| | B7 | - | 79.3 Ft^2 | 0.408 In^2 |

TABLE 1.

TEST CONDITIONS
TEST S-222

| MACH NUMBER | REYNOLDS NUMBER per (inch) | DYNAMIC PRESSURE (pounds/sq. inch) | STAGNATION TEMPERATURE (degrees Fahrenheit) |
|-------------|-------------------------------|---------------------------------------|--|
| 0.4 | 0.50×10^6 | 3.3 | 53 |
| 0.6 | 0.83×10^6 | 7.6 | 47 |
| 0.7 | 0.74×10^6 | 7.8 | 68 |
| 0.9 | 0.79×10^6 | 10.0 | 50 |
| 0.95 | 0.67×10^6 | 8.8 | 53 |
| 1.05 | 0.69×10^6 | 9.5 | 50 |
| 1.1 | 0.69×10^6 | 9.8 | 52 |
| 1.5 | 0.63×10^6 | 10.0 | 55 |
| 2.2 | 0.63×10^6 | 9.9 | 68 |
| 2.25 | 0.94×10^6 | 14.0 | 52 |
| 2.5 | 0.66×10^6 | 10.3 | 91 |
| 4.5 | 1.15×10^6 | 10.6 | 120 |
| | | | |
| | | | |
| | | | |
| | | | |

BALANCE UTILIZED: See Listing on next page.

CAPACITY:

ACCURACY:

COEFFICIENT
TOLERANCE:

NF _____
 SF _____
 AF _____
 PM _____
 YM _____
 RM _____

COMMENTS:

TABLE 1.

TEST CONDITIONS (CONTINUED)

BALANCES UTILIZED

Several balances were required during the test. Listed below are the balances used, their capacity and the corresponding tunnel runs which apply to each.

| <u>BALANCES</u> | | | | | |
|-----------------|----------------|-----|--|---------------------|-----|
| Runs | <u>Orbiter</u> | | | <u>Tank Balance</u> | |
| | 3/4" D. | | | 1" D. | |
| Runs 1-10 | #7 | DAL | | #13 | NAR |
| Runs 11-113 | - | | | #13 | NAR |
| Runs 114-184 | #5 | DAL | | - | |
| Runs 185-197 | - | | | #13 | NAR |
| Runs 198-270 | #58 | DAL | | #13 | NAR |
| Runs 271-420 | #58 | DAL | | #11 | DAL |
| Runs 421-424 | - | | | #11 | DAL |
| Runs 425-459 | - | | | #11 | DAL |
| Runs 460-474 | - | | | #11 | DAL |
| Runs 475-569 | #58 | DAL | | #11 | DAL |
| Runs 570-646 | - | | | #11 | DAL |

| Balance | MK. 31A | MK. 2A | MK. 10 | MK. 7 | MK. 3C |
|-------------|-----------------|----------------|-----------------|---------------|---------------|
| | 3/4" D. #7 DAL | 3/4" D. #5 DAL | 3/4" D. #58 DAL | 1" D. #13 NAR | 1" D. #11 DAL |
| <u>Gage</u> | <u>Capacity</u> | | | | |
| NF (each) | 100 lb. | 100 lb. | 100 lb. | 500 lb. | 250 lb. |
| 2 gages | | | | | |
| SF (each) | 100 lb. | 50 lb. | 100 lb. | 300 lb. | 250 lb. |
| 2 gages | | | | | |
| AF | 80 lb. | 25 lb. | 50 lb. | 500 lb. | 150 lb. |
| RM | 20 in.lb. | 60 in.lb. | 40 in.lb. | 150 in.lb. | 150 in.lb. |

TABLE 2. TEST S-2222

DATA SET COLLATION SHEET

(ϕ 1) ORBITER ISOLATED ON SEPARATE BALANCE.
(BX) BOOSTER ISOLATED WITHOUT W. BALANCE. ☐ PRETEST ☒ POSTTEST

| DATA SET IDENTIFIER | CONFIGURATION | SCHD. | | CONTROL DEFLECTION | | | | NO. OF RUNS | MACH NUMBERS | | | | | | | | | |
|---------------------|--------------------------|----------|---------|--------------------|------------|------------|--|-------------|--------------|-----|-----|------|------|-----|-----|-----|------|-----|
| | | α | β | δA | δE | δR | | | 0.4 | 0.6 | 0.9 | 0.95 | 1.05 | 1.1 | 1.5 | 2.2 | 2.25 | 4.5 |
| RD7101 | (ϕ 1) T1 B1 | A | 0 | 0 | 0 | 0 | | 3 | | 396 | 395 | | | 394 | | | | |
| 102 | | 0 | D | 0 | 0 | 0 | | 3 | | 396 | 395 | | | 394 | | | | |
| 103 | | A | 0 | 0 | 0 | 0 | | 2 | | | | | | | | | | |
| 104 | | A | 0 | 20 | 0 | 0 | | 6 | | 373 | 371 | | | 370 | 254 | 253 | | 266 |
| 105 | (ϕ 1) T1 B1L (B1R) | A | 0 | 0 | 0 | 0 | | 4 | | 374 | 374 | | | 375 | | 258 | | 267 |
| 106 | | 0 | D | 0 | 0 | 0 | | 2 | | 374 | | | | 375 | | | | |
| 107 | | A | 0 | 0 | 0 | 0 | | 2 | | | | | | | | | | |
| 108 | (ϕ 1) T1 (B1L) B1R | A | 0 | 0 | 0 | 0 | | 2 | | | | | | | | 215 | | 245 |
| 109 | (ϕ 1) T1 B2 | A | 0 | 0 | 0 | 0 | | 2 | | | | | | | 205 | 255 | | 244 |
| 110 | (ϕ 1) T1 B2L (B2R) | A | 0 | 0 | 0 | 0 | | 4 | | 387 | 387 | | | 388 | | 259 | | 268 |
| 111 | | 0 | D | 0 | 0 | 0 | | 2 | | 387 | | | | | | | | |
| 112 | | A | 0 | 0 | 0 | 0 | | 2 | | | | | | | | 227 | | 242 |
| 113 | (ϕ 1) T1 (B2L) B2R | A | 0 | 0 | 0 | 0 | | 2 | | | | | | | | 226 | | 243 |
| 114 | (ϕ 1) T1 B3 | A | 0 | 0 | 0 | 0 | | 6 | | 391 | 390 | | | 389 | 255 | 256 | | 264 |
| 115 | | 0 | D | 0 | 0 | 0 | | 3 | | 391 | 390 | | | 389 | | | | |
| 116 | | A | 0 | 0 | 0 | 0 | | 3 | | | | | | | 202 | 228 | | 234 |
| 117 | (ϕ 1) T1 B3L (B3R) | A | 0 | 0 | 0 | 0 | | 4 | | 392 | 392 | | | 393 | | 257 | | 265 |
| 118 | | 0 | D | 0 | 0 | 0 | | 2 | | 392 | | | | 393 | | | | |
| 119 | | A | 0 | 0 | 0 | 0 | | 2 | | | | | | | | 230 | | 241 |
| 120 | (ϕ 1) T1 (B3L) B3R | A | 0 | 0 | 0 | 0 | | 2 | | | | | | | | 229 | | 240 |

COEFFICIENTS:

α or β
SCHEDULES

A = $-10^\circ \rightarrow 10^\circ$
B = $10^\circ \rightarrow -10^\circ$
C = $-10^\circ \rightarrow 20^\circ$
D = $6^\circ \rightarrow -6^\circ$

IDPVAR(1) IDPVAR(2) NDV

BX - BOTH LEFT & RIGHT BOOSTERS
BXL - LEFT BOOSTER
BXR - RIGHT BOOSTER

TABLE 2. TEST S-222 DATA SET COLLATION SHEET (CONTINUED)

☐ PRETEST
☒ POSTTEST

| DATA SET IDENTIFIER | CONFIGURATION | SCHD. | | CONTROL DEFLECTION | | | | NO. OF RUNS | MACH NUMBERS | | | | | | | | | | | |
|---------------------|----------------------------|----------|---------|--------------------|------------|------------|--|-------------|--------------|-----|-----|------|------|-----|-----|-----|------|-----|--|--|
| | | α | β | δA | δE | δR | | | 0.4 | 0.6 | 0.9 | 0.95 | 1.05 | 1.1 | 1.5 | 2.2 | 2.25 | 4.5 | | |
| RD7121 | (ϕ) T1 B4 | A | 0 | 0 | 0 | 0 | | 6 | | 378 | 377 | | | 376 | 269 | 273 | | 276 | | |
| 122 | | A | 0 | 0 | 0 | 0 | | 1 | | | | | | | 272 | | | | | |
| 123 | | C | D | 0 | 0 | 0 | | 3 | | 378 | 377 | | | 376 | | | | | | |
| 124 | | A | 0 | 0 | 0 | 0 | | 3 | | | | | | 201 | 231 | 274 | | 238 | | |
| 125 | (ϕ) T1 B4L (B4R) | A | 0 | 0 | 0 | 0 | | 4 | | 380 | | | | 379 | | 274 | | 275 | | |
| 126 | | A | 0 | 0 | 0 | 0 | | 2 | | | | | | | | 233 | | 236 | | |
| 127 | | C | D | 0 | 0 | 0 | | 2 | | 380 | | | | 379 | | | | | | |
| 128 | (ϕ) T1 (B4L) B4R | A | 0 | 0 | 0 | 0 | | 2 | | | | | | | | 232 | | 237 | | |
| 129 | (ϕ) T1 B5 | A | 0 | 0 | 0 | 0 | | 2 | | | | | | 249 | | | | 248 | | |
| 130 | | A | 0 | 0 | 0 | 0 | | 1 | | | | | | 208 | | | | | | |
| 131 | (ϕ) T1 B5L (B5R) | A | 0 | 0 | 0 | 0 | | 1 | | | | | | | | | | 246 | | |
| 132 | (ϕ) T1 (B5L) B5R | A | 0 | 0 | 0 | 0 | | 1 | | | | | | | | | | 247 | | |
| 133 | (ϕ) V1 T1 B5 | A | 0 | 0 | 0 | 0 | | 6 | | 384 | 382 | | | 383 | 250 | 252 | | 251 | | |
| 134 | | C | D | 0 | 0 | 0 | | 3 | | 384 | 382 | | | 383 | | | | | | |
| 135 | | A | 0 | 0 | 0 | 0 | | 1 | | | | | | | | 218 | | | | |
| 136 | | C | A | 0 | 0 | 0 | | 1 | | | | | | | | 220 | | | | |
| 137 | (ϕ) V1 T1 B5L (B5R) | A | 0 | 0 | 0 | 0 | | 4 | | | | | | 385 | | 261 | | 262 | | |
| 138 | | C | D | 0 | 0 | 0 | | 2 | | | | | | 385 | | | | | | |
| 139 | | A | 0 | 0 | 0 | 0 | | 1 | | | | | | | | 216 | | | | |
| 140 | (ϕ) V1 T1 (B5L) B5R | A | 0 | 0 | 0 | 0 | | 1 | | | | | | | | 217 | | | | |

COEFFICIENTS: IDPVAR(1) IDPVAR(2) NDV

3 OF 8
SCHEDULES

TABLE 2. TEST S-222 DATA SET COLLATION SHEET (CONTINUED)

☐ PRETEST
☒ POSTTEST

| DATA SET IDENTIFIER | CONFIGURATION | SCHID. | | CONTROL DEFLECTION | | | NO. of RUNS | MACH NUMBERS | | | | | | | | | |
|---------------------|----------------------------|--------|---|--------------------|----|----|-------------|--------------|-----|-----|------|------|-----|-----|-----|------|-----|
| | | A | B | SA | SE | SR | | 0.4 | 0.6 | 0.9 | 0.95 | 1.05 | 1.1 | 1.5 | 2.2 | 2.25 | 4.5 |
| RD7141 | (ϕ , V1) T1 | A | 0 | 0 | 0 | 0 | 3 | | 399 | 398 | | | 397 | | | | |
| 142 | | 0 | D | 0 | 0 | 0 | 3 | | 399 | 398 | | | 397 | | | | |
| 143 | | A | 0 | 20 | 0 | 0 | 3 | | 401 | 402 | | | 400 | | | | |
| 144 | | 0 | D | 20 | 0 | 0 | 3 | | 401 | 402 | | | 400 | | | | |
| 145 | | A | 0 | 0 | 0 | 10 | 3 | | 405 | 404 | | | 403 | | | | |
| 146 | | 0 | D | 0 | 0 | 10 | 3 | | 405 | 404 | | | 403 | | | | |
| 147 | (ϕ , 1) T1 | A | 0 | 0 | 0 | 0 | 8 | 360 | 361 | 362 | 363 | 364 | 365 | | 260 | | 265 |
| 148 | | 0 | D | 0 | 0 | 0 | 6 | 360 | 361 | 362 | 363 | 364 | 365 | | | | |
| 149 | | A | 6 | 0 | 0 | 0 | 2 | | | | | | | | 234 | | 235 |
| 150 | (ϕ , 1) T2 B1 | A | 0 | 0 | 0 | 0 | 3 | | 415 | 416 | | | 417 | | | | |
| 151 | | 0 | D | 0 | 0 | 0 | 3 | | 415 | 416 | | | 417 | | | | |
| 152 | | A | 6 | 0 | 0 | 0 | 2 | | | | | | | 207 | 223 | | |
| 153 | (ϕ , 1) T2 B1L (B1R) | A | 6 | 0 | 0 | 0 | 1 | | | | | | | | 214 | | |
| 154 | (ϕ , 1) T2 B2 | A | 6 | 0 | 0 | 0 | 1 | | | | | | | 204 | | | |
| 155 | (ϕ , 1) T2 B3 | A | 6 | 0 | 0 | 0 | 1 | | | | | | | 203 | | | |
| 156 | (ϕ , 1) T2 B4 | A | 0 | 0 | 0 | 0 | 3 | | 420 | 419 | | | 418 | | | | |
| 157 | | 0 | D | 0 | 0 | 0 | 3 | | 420 | 419 | | | 418 | | | | |
| 158 | | A | 6 | 0 | 0 | 0 | 1 | | | | | | | 200 | | | |
| 159 | (ϕ , 1) T2 (B1L) B1R | A | 6 | 0 | 0 | 0 | 1 | | | | | | | 222 | | | |
| 160 | (ϕ , V1) T2 B5 | A | 0 | 0 | 0 | 0 | 3 | | 408 | 407 | | | 406 | | | | |

COEFFICIENTS:

IDPVAR(1) IDPVAR(2) NDV

a or b
 SCHEDULES

TABLE 2. TEST S-222 DATA SET COLLATION SHEET (CONTINUED)

☐ PRETEST
☒ POSTTEST

| DATA SET IDENTIFIER | CONFIGURATION | SCHD. | | CONTROL DEFLECTION | | | | NO. of RUNS | MACH NUMBERS | | | | | | | | | |
|---------------------|---------------------------|-------|---|--------------------|----|----|--|-------------|--------------|-----|-----|------|------|-----|-----|-----|------|-----|
| | | a | b | SA | SE | SR | | | 0.4 | 0.6 | 0.9 | 0.95 | 1.05 | 1.1 | 1.5 | 2.2 | 2.25 | 4.5 |
| R7161 | (ϕ 1V1) T2 B5 | 0 | D | 0 | 0 | 0 | | 3 | | 408 | 407 | | | 406 | | | | |
| 162 | (ϕ 1V1) T2A B5 | A | 0 | 0 | 0 | 0 | | 3 | | 409 | 410 | | | 411 | | | | |
| 163 | \downarrow | 0 | D | 0 | 0 | 0 | | 3 | | 409 | 410 | | | 411 | | | | |
| 164 | (ϕ 1) T2A B1 | 0 | A | 0 | 0 | 0 | | 1 | | | | | | | 211 | | | |
| 165 | \downarrow | A | D | 0 | 0 | 0 | | 3 | | 414 | 413 | | | 412 | | | | |
| 166 | \downarrow | 0 | D | 0 | 0 | 0 | | 3 | | 414 | 413 | | | 412 | | | | |
| 167 | \downarrow | A | 0 | 0 | 0 | 0 | | 2 | | | | | | 209 | 210 | | | |
| 168 | (ϕ 1) T2A B1L (B1R) | A | 0 | 0 | 0 | 0 | | 1 | | | | | | | 213 | | | |
| 169 | (ϕ 1) T2A (B1L) B1R | A | 0 | 0 | 0 | 0 | | 1 | | | | | | | 212 | | | |
| 170 | (ϕ 1) T2 | A | 0 | 0 | 0 | 0 | | 2 | | | | | | 366 | | | | |
| 171 | \downarrow | 0 | D | 0 | 0 | 0 | | 2 | | | | | | 367 | | | | |
| 172 | (ϕ 1) T2A | A | 0 | 0 | 0 | 0 | | 2 | | | | | | 368 | | | | |
| 173 | \downarrow | 0 | D | 0 | 0 | 0 | | 2 | | | | | | 368 | | | | |
| 174 | (ϕ 1) T3 B1 | A | 0 | 0 | 0 | 0 | | 6 | | 333 | 329 | | | 331 | 277 | 278 | 279 | |
| 175 | \downarrow | 0 | A | 0 | 0 | 0 | | 3 | | 334 | 330 | | | 332 | | | | |
| 176 | \downarrow | A | 0 | 0 | 0 | 0 | | 3 | | | | | | 309 | 308 | | 310 | |
| 177 | (ϕ 1) T3 B1L (B1R) | A | 0 | 0 | 0 | 0 | | 4 | | | | | | 335 | | 281 | 280 | |
| 178 | \downarrow | 0 | D | 0 | 0 | 0 | | 2 | | | | | | 335 | | | | |
| 179 | \downarrow | A | 0 | 0 | 0 | 0 | | 2 | | | | | | 328 | | 312 | 311 | |
| 180 | (ϕ 1) T3 (B1L) B1R | A | 0 | 0 | 0 | 0 | | 4 | | | | | | 327 | | 313 | 314 | |

COEFFICIENTS: $\frac{IDPVAR(1)}{IDPVAR(2)} \cdot NDV$

a or b
SCHEDULES

TABLE 2. TEST S-222 DATA SET COLLATION SHEET (CONTINUED)

☐ PRETEST
☒ POSTTEST

| DATA SET IDENTIFIER | CONFIGURATION | SCHD. | | CONTROL DEFLECTION | | | | NO. OF RUNS | MACH NUMBERS | | | | | | | | | |
|---------------------|-------------------|-------|---|--------------------|----|----|----|-------------|--------------|-----|-----|------|------|-----|-----|-----|------|-----|
| | | A | B | δA | δE | δR | | | 0.4 | 0.6 | 0.9 | 0.95 | 1.05 | 1.1 | 1.5 | 2.2 | 2.25 | 4.5 |
| R02181 | (φ1) T3 (B1L) B1R | A | 6 | 0 | 0 | 0 | 0 | 1 | | | | | | | | 326 | | |
| 182 | (φ1) T3 B2 | A | 0 | 0 | 0 | 0 | 0 | 5 | | 350 | 351 | | | | | 296 | | 297 |
| 183 | ↓ | 0 | D | 0 | 0 | 0 | 0 | 3 | | 350 | 351 | | | | | | | |
| 184 | (φ1) T3 B2L (B2R) | A | 0 | 0 | 0 | 0 | 0 | 4 | | 354 | 354 | | | | | 294 | | 298 |
| 185 | ↓ | 0 | D | 0 | 0 | 0 | 0 | 2 | | 354 | | | | | | | | |
| 186 | ↓ | A | 6 | 0 | 0 | 0 | 0 | 2 | | | | | | | | 300 | | 301 |
| 187 | (φ1) T3 (B2L) B2R | A | 6 | 0 | 0 | 0 | 0 | 2 | | | | | | | | 303 | | 302 |
| 188 | (φ1) T3 B3 | A | 0 | 0 | 0 | 0 | 0 | 6 | | 356 | 355 | | | | | 357 | 286 | 288 |
| 189 | ↓ | 0 | D | 0 | 0 | 0 | 0 | 3 | | 356 | 355 | | | | | | | |
| 190 | ↓ | A | 6 | 0 | 0 | 0 | 0 | 2 | | | | | | | 317 | 318 | | |
| 191 | (φ1) T3 B3L (B3R) | A | 0 | 0 | 0 | 0 | 0 | 4 | | 359 | | | | | | 285 | | 284 |
| 192 | ↓ | 0 | D | 0 | 0 | 0 | 0 | 2 | | 359 | | | | | | | | |
| 193 | ↓ | A | 6 | 0 | 0 | 0 | 0 | 1 | | | | | | | | 319 | | |
| 194 | (φ1) T3 (B3L) B3R | A | 6 | 0 | 0 | 0 | 0 | 1 | | | | | | | | 320 | | |
| 195 | (φ1) T3 B4 | A | 0 | 0 | 0 | 0 | 0 | 1 | | | | | | | | | | |
| 196 | ↓ | 0 | A | 0 | 0 | 0 | 0 | 1 | | | | | | | | | | |
| 197 | ↓ | A | 0 | 20 | 0 | 0 | 0 | 1 | | | | | | | | | | |
| 198 | ↓ | A | 0 | 0 | 0 | 0 | 10 | 2 | | | | | | | 4 | 8 | | |
| 199 | (φ1) T3 B4L (B4R) | A | 0 | 0 | 0 | 0 | 0 | 4 | | 338 | | | | | | 282 | | 283 |
| 1A1 | ↓ | 0 | D | 0 | 0 | 0 | 0 | 2 | | 338 | | | | | | | | |

COEFFICIENTS:

IDPVAR(1) IDPVAR(2) IDV

α or β

SCHEDULES

TABLE 2. TEST S-222 DATA SET COLLATION SHEET (CONTINUED)

☐ PRETEST
☒ POSTTEST

| DATA SET IDENTIFIER | CONFIGURATION | SCHD. | | CONTROL DEFLECTION | | | | NO. OF RUNS | MACH NUMBERS | | | | | | | | | |
|---------------------|-----------------------------|-------|---|--------------------|----|----|--|-------------|--------------|-----|-----|------|------|-----|-----|-----|------|-----|
| | | a | b | SA | SE | SR | | | 0.4 | 0.6 | 0.9 | 0.95 | 1.05 | 1.1 | 1.5 | 2.2 | 2.25 | 4.5 |
| RD71A2 | (ϕ 1) T3 B4L (B4R) | A | 6 | 0 | 0 | 0 | | 2 | | | | | | | | 307 | | 306 |
| 1A3 | (ϕ 1) T3 (B4L) B4R | A | 6 | 0 | 0 | 0 | | 2 | | | | | | | | 304 | | 305 |
| 1A4 | (ϕ 1) T3 B4 F4 | A | 0 | 0 | 0 | 0 | | 2 | | | | | | | 6 | 7 | | |
| 1A5 | (ϕ 1 V1) T3 B5 | A | 0 | 0 | 0 | 0 | | 6 | 341 | 339 | | | | 340 | 292 | 291 | | 293 |
| 1A6 | ↓ | C | D | 0 | 0 | 0 | | 3 | 341 | 339 | | | | 340 | | | | |
| 1A7 | ↓ | A | 6 | 0 | 0 | 0 | | 2 | | | | | | | 322 | 321 | | |
| 1A8 | (ϕ 1 V1) T3 B5L (B5R) | A | 0 | 0 | 0 | 0 | | 4 | | 342 | | | | 343 | | 295 | | 294 |
| 1A9 | ↓ | C | D | 0 | 0 | 0 | | 2 | | 342 | | | | 343 | | | | |
| 1B1 | ↓ | A | 6 | 0 | 0 | 0 | | 1 | | | | | | | | 324 | | |
| 1B2 | (ϕ 1 V1) T3 (B5L) B5R | A | 6 | 0 | 0 | 0 | | 1 | | | | | | | | 325 | | |
| 1B3 | (ϕ 1) T3 | A | 0 | 0 | 0 | 0 | | 8 | 349 | 348 | 347 | 346 | 345 | 344 | | 290 | | 289 |
| 1B4 | ↓ | C | D | 0 | 0 | 0 | | 6 | 349 | 348 | 347 | 346 | 345 | 344 | | | | |
| 1B5 | ↓ | A | 6 | 0 | 0 | 0 | | 2 | | | | | | | | 316 | | 315 |
| 1B6 | (ϕ 1 V1) T1 B5 | C | D | 0 | 0 | 0 | | 3 | | | | | | | 558 | 563 | | 566 |
| 1B7 | (ϕ 1 V1) T1 | A | 0 | 20 | 0 | 0 | | 3 | | | | | | | 557 | 562 | | 567 |
| 1B8 | ↓ | C | D | 20 | 0 | 0 | | 3 | | | | | | | 557 | 562 | | 567 |
| 1B9 | (ϕ 1 V1) T2 B5 | A | 0 | 0 | 0 | 0 | | 3 | | | | | | | 559 | 564 | | 565 |
| 1C1 | (ϕ 1) T1 B6 | A | 0 | 0 | 0 | 0 | | 2 | 496 | | | | | | 556 | | | |
| 1C2 | ↓ | C | D | 0 | 0 | 0 | | 2 | 496 | | | | | | 556 | | | |
| 1C3 | ↓ | A | 0 | 20 | 0 | 0 | | 6 | 495 | 494 | | | | 493 | 555 | 554 | | 569 |

COEFFICIENTS: 19 25 31 37 43 49 55 61 67 7576

a or b
 SCHEDULES

IDPVAR(1) IDPVAR(2) NDV

TABLE 2. TEST S-222 DATA SET COLLATION SHEET (CONTINUED)

☐ PRETEST
☒ POSTTEST

| DATA SET IDENTIFIER | CONFIGURATION | SCHD. | | CONTROL DEFLECTION | | | | NO. OF RUNS | MACH NUMBERS | | | | | | | | | |
|---------------------|-----------------------|-------|---|--------------------|----|----|--|-------------|--------------|-----|------|------|------|-----|-----|-----|------|-----|
| | | A | B | SA | SE | SR | | | 0.4 | 0.6 | 0.90 | 0.95 | 1.05 | 1.1 | 1.5 | 2.2 | 2.25 | 4.5 |
| RD71C4 | (ϕ 1) T1 B6 | 0 | D | 20 | 0 | 0 | | 6 | | 495 | 494 | | | 493 | 555 | 554 | | 569 |
| 1C5 | | | | | | | | | | | | | | | | | | |
| 1C6 | (ϕ 1V1) T1 B5 | A | C | 0 | 0 | 0 | | 3 | | | | | | | 558 | 563 | | 566 |
| 1C7 | (ϕ 1) T4 B7A1-4 | A | 0 | 0 | 0 | 0 | | 6 | | 477 | 476 | | | 475 | 544 | 542 | | 539 |
| 1C8 | | 0 | D | 0 | 0 | 0 | | 6 | | 477 | 476 | | | 475 | 544 | 542 | | 539 |
| 1C9 | | A | C | 0 | 0 | 0 | | 6 | | 506 | 507 | | | 504 | 517 | 520 | | 527 |
| 1D1 | | A | 0 | 20 | 0 | 0 | | 6 | | 478 | 479 | | | 480 | 550 | 543 | | 538 |
| 1D2 | | 0 | D | 20 | 0 | 0 | | 6 | | 478 | 479 | | | 480 | 550 | 543 | | 538 |
| 1D3 | | A | C | 20 | 0 | 0 | | 6 | | 511 | 508 | | | 509 | 516 | 521 | | 526 |
| 1D4 | | A | 0 | 0 | 0 | 10 | | 6 | | 483 | 482 | | | 481 | 551 | 544 | | 537 |
| 1D5 | | 0 | D | 0 | 0 | 10 | | 6 | | 483 | 482 | | | 481 | 551 | 544 | | 537 |
| 1D6 | V | A | C | 0 | 0 | 10 | | 6 | | 512 | 513 | | | 514 | 515 | 522 | | 525 |
| 1D7 | (ϕ 1) T4 B7-4 | A | 0 | 0 | 0 | 0 | | 3 | | 489 | 488 | | | 487 | | | | |
| 1D8 | V | 0 | D | 0 | 0 | 0 | | 3 | | 489 | 488 | | | 487 | | | | |
| 1D9 | (ϕ 1) T4 | A | 0 | 0 | 0 | 0 | | 6 | | 490 | 491 | | | 492 | 548 | 547 | | 536 |
| 1E1 | | 0 | D | 0 | 0 | 0 | | 6 | | 490 | 491 | | | 492 | 548 | 547 | | 536 |
| 1E2 | | E | C | 0 | 0 | 0 | | 1 | | | | | | | | | | 534 |
| 1E3 | V | E | C | 0 | 0 | 0 | | 1 | | | | | | | | | | 531 |
| 1E4 | (ϕ 1) T4 B7A1-5 | A | 0 | 0 | 0 | 0 | | 6 | | 484 | 485 | | | 486 | 552 | 545 | | 540 |
| 1E5 | V | 0 | D | 0 | 0 | 0 | | 6 | | 484 | 485 | | | 486 | 552 | 545 | | 540 |

COEFFICIENTS: $E = -10^6 \rightarrow 30^0$ IDPVAR(1) IDPVAR(2) INDV

a or b
 SCHEDULES

*830-528

TABLE 2. TEST S-222 DATA SET COLLATION SHEET (CONTINUED)

TANK & BOOSTERS @ TANK MRC

☐ PRETEST

☒ POSTTEST

| DATA SET IDENTIFIER | CONFIGURATION | SCHUD. | | CONTROL DEFLECTION | | | | NO. of RUNS | MACH NUMBERS | | | | | | | | | |
|---------------------|---------------|----------|---------|--------------------|--|--|--|-------------|--------------|--|--|--|--|--|--|--|--|--|
| | | α | β | | | | | | | | | | | | | | | |
| RD7201 | NOTE: SAME AS | | | | | | | | | | | | | | | | | |
| 202 | DATA SETS | | | | | | | | | | | | | | | | | |
| 203 | RD71XX | | | | | | | | | | | | | | | | | |
| 204 | | | | | | | | | | | | | | | | | | |
| 205 | | | | | | | | | | | | | | | | | | |
| 206 | | | | | | | | | | | | | | | | | | |
| 207 | | | | | | | | | | | | | | | | | | |
| 208 | | | | | | | | | | | | | | | | | | |
| 209 | | | | | | | | | | | | | | | | | | |
| 210 | | | | | | | | | | | | | | | | | | |
| 211 | | | | | | | | | | | | | | | | | | |
| 212 | | | | | | | | | | | | | | | | | | |
| 213 | | | | | | | | | | | | | | | | | | |
| 214 | | | | | | | | | | | | | | | | | | |
| 215 | | | | | | | | | | | | | | | | | | |
| 216 | | | | | | | | | | | | | | | | | | |
| 217 | | | | | | | | | | | | | | | | | | |
| 218 | | | | | | | | | | | | | | | | | | |
| 219 | | | | | | | | | | | | | | | | | | |
| 220 | | | | | | | | | | | | | | | | | | |

COEFFICIENTS:

1 7 13 19 25 31 37 43 49 55 61 67 7576
 CN CY CA CAF CBL CLM EXN I MACH ALPHA BETA 7

IDPVAR(1) IDPVAR(2) INDV

a or b
 SCHEDULES

| TABLE 2. TEST | <u>S-222</u> | DATA SET COLLATION SHEET (CONTINUED) |
|---------------|--------------|--------------------------------------|
|---------------|--------------|--------------------------------------|

☐ PRETEST
☒ POSTTEST

[illegible]

COEFFICIENTS:

a or b
SCHEDULES

IDPVAR(1) IDPVAR(2) NDV

TABLE 2. TEST S-222 DATA SET COLLATION SHEET (CONTINUED)

COMPOSITE @ TANK MRC

☐ PRETEST
☒ POSTTEST

| DATA SET IDENTIFIER | CONFIGURATION | SCHD. | | CONTROL DEFLECTION | | | | NO. OF RUNS | MACH NUMBERS | | | | | | | | | |
|---------------------|---------------|-------|---|--------------------|--|--|--|-------------|--------------|--|--|--|--|--|--|--|--|--|
| | | a | b | | | | | | | | | | | | | | | |
| RD7401 | NOTE: SAME AS | | | | | | | | | | | | | | | | | |
| 402 | DATA SETS | | | | | | | | | | | | | | | | | |
| 403 | RD71XX | | | | | | | | | | | | | | | | | |
| 404 | | | | | | | | | | | | | | | | | | |
| 405 | | | | | | | | | | | | | | | | | | |
| 406 | | | | | | | | | | | | | | | | | | |
| 407 | | | | | | | | | | | | | | | | | | |
| 408 | | | | | | | | | | | | | | | | | | |
| 409 | | | | | | | | | | | | | | | | | | |
| 410 | | | | | | | | | | | | | | | | | | |
| 411 | | | | | | | | | | | | | | | | | | |
| 412 | | | | | | | | | | | | | | | | | | |
| 413 | | | | | | | | | | | | | | | | | | |
| 414 | | | | | | | | | | | | | | | | | | |
| 415 | | | | | | | | | | | | | | | | | | |
| 416 | | | | | | | | | | | | | | | | | | |
| 417 | | | | | | | | | | | | | | | | | | |
| 418 | | | | | | | | | | | | | | | | | | |
| 419 | | | | | | | | | | | | | | | | | | |
| 420 | | | | | | | | | | | | | | | | | | |

COEFFICIENTS: CN CY CA CAF CBL ELM EXN 1 43 49 55 61 67 75/6
 IDPVAR(1) IDPVAR(2) IDV

a or b
SCHEDULES

TABLE 2. TEST S-222 DATA SET COLLATION SHEET (CONTINUED)

COMPOSITE @ TANK MRC

☐ PRETEST
☒ POSTTEST

| DATA SET IDENTIFIER | CONFIGURATION | SCHD. | | | | CONTROL DEFLECTION | | | | NO. OF RUNS | MACH NUMBERS | | | | | | | | | | | |
|---------------------|------------------|-------|---|----|---|--------------------|----|---|---|-------------|--------------|-----|-----|------|------|-----|-----|-----|------|-----|--|--|
| | | A | B | C | D | E | F | G | H | | 0.4 | 0.6 | 0.9 | 0.95 | 1.05 | 1.1 | 1.5 | 2.2 | 2.25 | 4.5 | | |
| RD7501 | φ171B1 | A | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 7 | | 77 | 78 | | | 79 | 16 | 11 | 421 | 21 | | |
| 502 | | A | 6 | 0 | 0 | 0 | 0 | 0 | 0 | 6 | | 95 | 94 | | | 93 | 25 | 26 | | 33 | | |
| 503 | | A | 6 | 0 | 0 | 0 | 0 | 0 | 0 | 1 | | | | | | | | 197 | | | | |
| 504 | | 0 | B | 0 | 0 | 0 | 0 | 0 | 0 | 4 | | 77 | 78 | | | | 16 | 11 | | | | |
| 505 | | 0 | D | 0 | 0 | 0 | 0 | 0 | 0 | 1 | | | | | | | | | 421 | | | |
| 506 | | 0 | A | 0 | 0 | 0 | 0 | 0 | 0 | 1 | | | | | | 80 | | | | | | |
| 507 | φ171B1+PUME(2.5) | A | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 2 | | | | | | | | 185 | 422 | | | |
| 508 | | A | 6 | 0 | 0 | 0 | 0 | 0 | 0 | 1 | | | | | | | | 196 | | | | |
| 509 | | A | 0 | 20 | 0 | 0 | 0 | 0 | 0 | 2 | | | | | | | | 186 | 423 | | | |
| 510 | | A | 0 | 0 | 0 | 0 | 10 | 0 | 0 | 2 | | | | | | | | 187 | 424 | | | |
| 511 | | 0 | D | 0 | 0 | 0 | 0 | 0 | 0 | 1 | | | | | | | | | 422 | | | |
| 512 | | 0 | D | 20 | 0 | 0 | 0 | 0 | 0 | 1 | | | | | | | | | 423 | | | |
| 513 | | 0 | D | 0 | 0 | 0 | 10 | 0 | 0 | 1 | | | | | | | | | 424 | | | |
| 514 | φ171B2 | A | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 6 | | 84 | 85 | | | 86 | 15 | 12 | | 23 | | |
| 515 | | A | 6 | 0 | 0 | 0 | 0 | 0 | 0 | 6 | | 87 | 88 | | | 89 | 24 | 27 | | 32 | | |
| 516 | φ171B2S | A | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 5 | | 83 | 82 | | | 81 | 14 | 13 | | | | |
| 517 | | A | 6 | 0 | 0 | 0 | 0 | 0 | 0 | 6 | | 92 | 91 | | | 90 | 28 | 29 | | 31 | | |
| 518 | φ173B2 | A | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 1 | | | | | | | 49 | | | | | |
| 519 | | A | 6 | 0 | 0 | 0 | 0 | 0 | 0 | 3 | | | | | | | 48 | 39 | | 38 | | |
| 520 | φ173B4 | A | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 6 | | 71 | 72 | | | 73 | 51 | 56 | | 59 | | |

COEFFICIENTS: CN CY CA CAF CBL CLM CYN MACH ALPHA BETA NDV
IDPVAR(1) IDPVAR(2)

a or b
SCHEDULES

TABLE 2. TEST S-222 DATA SET COLLATION SHEET (CONTINUED)

☐ PRETEST
☒ POSTTEST

| DATA SET IDENTIFIER | CONFIGURATION | SCHD. | | CONTROL DEFLECTION | | | | NO. OF RUNS | MACH NUMBERS | | | | | | | | | |
|---------------------|----------------------------|-------|---|--------------------|----|----|--|-------------|--------------|-----|-----|------|------|-----|-----|-----|------|-----|
| | | A | B | SA | SE | SR | | | 0.4 | 0.6 | 0.9 | 0.95 | 1.05 | 1.1 | 1.5 | 2.2 | 2.25 | 4.5 |
| RD7521 | $\phi 173 B4$ | 0 | A | 0 | 0 | 0 | | 6 | | 71 | 72 | | | 73 | 51 | 56 | | 60 |
| 522 | | A | C | 0 | 0 | 0 | | 6 | | 99 | 100 | | | 101 | 46 | 42 | | 35 |
| 523 | | C | B | 0 | 0 | 0 | | 6 | | 104 | 103 | | | 102 | 45 | 43 | | 36 |
| 524 | | A | 0 | 20 | 0 | 0 | | 6 | | 69 | 67 | | | 68 | 53 | 54 | | 61 |
| 525 | \vee | A | 0 | 0 | 0 | 10 | | 6 | | 70 | 64 | | | 63 | 52 | 55 | | 62 |
| 526 | $\phi 173 B4 F4$ | A | 0 | 0 | 0 | 0 | | 6 | | 76 | 75 | | | 74 | 50 | 57 | | 58 |
| 527 | \vee | A | C | 0 | 0 | 0 | | 6 | | 98 | 97 | | | 96 | 47 | 40 | | 37 |
| 528 | $\phi 171 B1$ | A | 0 | 0 | 0 | 0 | | 2 | | | | | | | 425 | 431 | | |
| 529 | | 0 | D | 0 | 0 | 0 | | 2 | | | | | | | 425 | 431 | | |
| 530 | | A | 0 | 20 | 0 | 0 | | 2 | | | | | | | 426 | 432 | | |
| 531 | | 0 | D | 20 | 0 | 0 | | 2 | | | | | | | 426 | 432 | | |
| 532 | | A | 0 | 10 | 0 | 0 | | 1 | | | | | | | 427 | | | |
| 533 | | 0 | D | 10 | 0 | 0 | | 1 | | | | | | | 427 | | | |
| 534 | | A | 0 | -10 | 0 | 0 | | 1 | | | | | | | 428 | | | |
| 535 | | 0 | D | -10 | 0 | 0 | | 1 | | | | | | | 428 | | | |
| 536 | | A | 0 | 0 | 0 | 10 | | 2 | | | | | | | 429 | 430 | | |
| 537 | \vee | 0 | D | 0 | 0 | 10 | | 2 | | | | | | | 429 | 430 | | |
| 538 | $\phi 171 B1 + PLUME (15)$ | A | 0 | 0 | 0 | 0 | | 2 | | | | | | | 434 | 437 | | |
| 539 | | 0 | D | 0 | 0 | 0 | | 2 | | | | | | | 434 | 437 | | |
| 540 | \vee | A | 0 | 20 | 0 | 0 | | 2 | | | | | | | 433 | 438 | | |

COEFFICIENTS:

a or b

SCHEDULES

IDPVAR(1) IDPVAR(2) INDV

TABLE 2. TEST S-222 DATA SET COLLATION SHEET (CONTINUED)

☐ PRETEST
☒ POSTTEST

| DATA SET IDENTIFIER | CONFIGURATION | SCHD. | | CONTROL DEFLECTION | | | NO. OF RUNS | MACH NUMBERS | | | | | | | | | |
|---------------------|-------------------------------|----------|---|--------------------|----|----|-------------|--------------|-----|-----|------|------|-----|-----|-----|------|-----|
| | | α | R | SA | SE | SR | | 0.4 | 0.6 | 0.9 | 0.95 | 1.05 | 1.1 | 1.5 | 2.2 | 2.25 | 4.5 |
| RD2541 | $\phi 171B + P_{Lume} (1.5)$ | 0 | D | 20 | 0 | 0 | 2 | | | | | | | 433 | 438 | | |
| 542 | | A | 0 | 0 | 0 | 10 | 2 | | | | | | | 435 | 436 | | |
| 543 | \downarrow | 0 | D | 0 | 0 | 10 | 2 | | | | | | | 435 | 436 | | |
| 544 | T3B2 | A | 0 | - | - | - | 2 | | | | | | | 442 | 439 | | |
| 545 | \downarrow | 0 | D | - | - | - | 2 | | | | | | | 442 | 437 | | |
| 546 | T3B5 | A | 0 | - | - | - | 2 | | | | | | | 441 | 440 | | |
| 547 | \downarrow | 0 | D | - | - | - | 2 | | | | | | | 441 | 440 | | |
| 548 | $\phi 173B6$ | A | 0 | 0 | 0 | 0 | 2 | | | | | | | 443 | 448 | | |
| 549 | | 0 | D | 0 | 0 | 0 | 2 | | | | | | | 443 | 448 | | |
| 550 | | A | 0 | 20 | 0 | 0 | 2 | | | | | | | 444 | 447 | | |
| 551 | | 0 | D | 20 | 0 | 0 | 2 | | | | | | | 444 | 447 | | |
| 552 | | A | 0 | 0 | 0 | 10 | 2 | | | | | | | 445 | 449 | | |
| 553 | | 0 | D | 0 | 0 | 10 | 2 | | | | | | | 445 | 449 | | |
| 554 | | A | 0 | 0 | 0 | 10 | 1 | | | | | | | 446 | | | |
| 555 | \downarrow | 0 | D | 0 | 0 | 10 | 1 | | | | | | | 446 | | | |
| 556 | $\phi 173B6 + P_{Lume} (1.5)$ | A | 0 | 0 | 0 | 0 | 1 | | | | | | | 455 | | | |
| 557 | | 0 | D | 0 | 0 | 0 | 1 | | | | | | | 455 | | | |
| 558 | | A | 0 | 20 | 0 | 0 | 1 | | | | | | | 454 | | | |
| 559 | | 0 | D | 20 | 0 | 0 | 1 | | | | | | | 454 | | | |
| 560 | \downarrow | A | 0 | 0 | 0 | 10 | 1 | | | | | | | 453 | | | |

COEFFICIENTS:

α or β

SCHEDULES

IDPVAR(1) IDPVAR(2) INDV

TABLE 2. TEST S-222 DATA SET COLLATION SHEET (CONTINUED)

☐ PRETEST
☒ POSTTEST

| DATA SET IDENTIFIER | CONFIGURATION | SCHD. | | CONTROL DEFLECTION | | | | NO. of RUNS | MACH NUMBERS | | | | | | | | | |
|---------------------|-----------------------------------|----------|---------|--------------------|------------|------------|--|-------------|--------------|-----|------|------|------|-----|-----|-----|------|-----|
| | | α | β | δA | δE | δR | | | 0.4 | 0.6 | 0.90 | 0.95 | 1.05 | 1.1 | 1.5 | 2.2 | 2.25 | 4.5 |
| RD7561 | $\phi 173 B6 + P_{LUNE}(1.5)$ | 0 | D | 0 | 0 | 10 | | 1 | | | | | | | 453 | | | |
| 562 | $\phi 173 B6 + P_{LUNE}(2.2)$ | A | 0 | 0 | 0 | 0 | | 1 | | | | | | | | 450 | | |
| 563 | | 0 | D | 0 | 0 | 0 | | 1 | | | | | | | | 450 | | |
| 564 | | A | 0 | 20 | 0 | 0 | | 1 | | | | | | | | 451 | | |
| 565 | | 0 | D | 20 | 0 | 0 | | 1 | | | | | | | | 451 | | |
| 566 | | A | 0 | 0 | 0 | 10 | | 1 | | | | | | | | 452 | | |
| 567 | | 0 | D | 0 | 0 | 10 | | 1 | | | | | | | | 452 | | |
| 568 | T185 | A | 0 | - | - | - | | 2 | | | | | | | | 452 | 458 | |
| 569 | | 0 | D | - | - | - | | 2 | | | | | | | | 457 | 458 | |
| 570 | T186 | A | 0 | - | - | - | | 6 | | 471 | 470 | | | | | 464 | 452 | 459 |
| 571 | | 0 | D | - | - | - | | 6 | | 471 | 470 | | | | | 464 | 456 | 459 |
| 572 | $\phi 174 B7A1-4$ | A | 0 | 0 | 0 | 0 | | 4 | | | 460 | | | | | 461 | 598 | 572 |
| 573 | | 0 | D | 0 | 0 | 0 | | 4 | | | 460 | | | | | 461 | 598 | 572 |
| 574 | $\phi 174 B7A1-4 + P_{LUNE}(1.5)$ | A | 0 | 0 | 0 | 0 | | 1 | | | | | | | | 586 | | |
| 575 | | 0 | D | 0 | 0 | 0 | | 1 | | | | | | | | 586 | | |
| 576 | | A | 0 | 20 | 0 | 0 | | 1 | | | | | | | | 588 | | |
| 577 | | 0 | D | 20 | 0 | 0 | | 1 | | | | | | | | 588 | | |
| 578 | | A | 0 | 0 | 0 | 10 | | 1 | | | | | | | | 587 | | |
| 579 | | 0 | D | 0 | 0 | 10 | | 1 | | | | | | | | 587 | | |
| 580 | $\phi 174 B7A1-4 + P_{LUNE}(2.2)$ | A | 0 | 0 | 0 | 0 | | 1 | | | | | | | | 577 | | |

COEFFICIENTS:

 α or β

SCHEDULES

IDPVAR(1) IDPVAR(2) NDV

TABLE 2. TEST S-222 DATA SET COLLATION SHEET (CONTINUED)

☐ PRETEST
☒ POSTTEST

| DATA SET IDENTIFIER | CONFIGURATION | SCHU. | | CONTROL DEFLECTION | | | | | NO. of RUNS | MACH NUMBERS | | | | | | | | | |
|---------------------|---------------------|-------|---|--------------------|----|----|-----|-----|-------------|--------------|-----|-----|------|------|-----|-----|-----|------|-----|
| | | a | b | SA | SE | SR | SRE | SRE | | 0.7 | 0.6 | 0.4 | 0.95 | 1.05 | 1.1 | 1.5 | 2.2 | 2.25 | 4.5 |
| R07581 | 174B7A1-4+Pume(2.2) | 0 | D | 0 | 0 | 0 | 0 | 0 | 1 | | | | | | | | | | |
| 582 | | A | 0 | 20 | 0 | 0 | 0 | 0 | 1 | | | | | | | | | | |
| 583 | | 0 | D | 30 | 0 | 0 | 0 | 0 | 1 | | | | | | | | | | |
| 584 | | A | 0 | 0 | 0 | 10 | 0 | 0 | 1 | | | | | | | | | | |
| 585 | | 0 | D | 0 | 0 | 10 | 0 | 0 | 1 | | | | | | | | | | |
| 586 | 174F1B7A1-4 | A | 0 | 0 | 0 | 0 | 0 | 0 | 2 | | | | | | | | | | |
| 587 | | 0 | D | 0 | 0 | 0 | 0 | 0 | 2 | | | | | | | | | | |
| 588 | 74B7A1-4 | A | 0 | - | - | - | - | - | 6 | | | | | | | | | | |
| 589 | | 0 | D | - | - | - | - | - | 6 | | | | | | | | | | |
| 590 | 74F1B7A1-4 | A | 0 | - | - | - | - | - | 4 | | | | | | | | | | |
| 591 | | 0 | D | - | - | - | - | - | 4 | | | | | | | | | | |
| 592 | 174B7A1-4 | A | 0 | 0 | 0 | 0 | 0 | 0 | 2 | | | | | | | | | | |
| 593 | | 0 | D | 0 | 0 | 0 | 0 | 0 | 2 | | | | | | | | | | |
| 594 | | A | 0 | 0 | 0 | 10 | 0 | 0 | 2 | | | | | | | | | | |
| 595 | | 0 | D | 0 | 0 | 10 | 0 | 0 | 2 | | | | | | | | | | |
| 596 | | A | 0 | 0 | 0 | 0 | 20 | 0 | 2 | | | | | | | | | | |
| 597 | | 0 | D | 0 | 0 | 0 | 20 | 0 | 2 | | | | | | | | | | |
| 598 | | A | 0 | 0 | 0 | 10 | 20 | 0 | 2 | | | | | | | | | | |
| 599 | | 0 | D | 0 | 0 | 10 | 20 | 0 | 2 | | | | | | | | | | |
| 5A1 | 174B7A1-4+Pume(1.5) | 0 | D | 0 | 0 | 0 | 0 | 0 | 1 | | | | | | | | | | |

COEFFICIENTS:

IDPVAR(1) IDPVAR(2) NDV

a or b
SCHEDULES

TABLE 2. TEST S-222 DATA SET COLLATION SHEET (CONTINUED)

☐ PRETEST
☒ POSTTEST

| DATA SET IDENTIFIER | CONFIGURATION | SCHD. | | CONTROL DEFLECTION | | | | | NO. of RUNS | MACH NUMBERS | | | | | | | | | |
|---------------------|------------------------|-------|---|--------------------|----|----|-----|----|-------------|--------------|-----|-----|------|------|-----|-----|-----|------|-----|
| | | a | k | SA | SE | SP | SRE | | | 0.4 | 0.6 | 0.9 | 0.95 | 1.05 | 1.1 | 1.5 | 2.2 | 2.25 | 4.5 |
| R075A2 | 01V1T4B7A1-4+Pume(1.5) | 0 | D | 0 | 0 | 0 | 0 | 0 | 1 | | | | | | | 582 | | | |
| 5A3 | | A | 0 | 0 | 0 | 0 | 10 | 0 | 1 | | | | | | | 583 | | | |
| 5A4 | | 0 | D | 0 | 0 | 0 | 10 | 0 | 1 | | | | | | | 583 | | | |
| 5A5 | | A | 0 | 0 | 0 | 0 | 0 | 20 | 1 | | | | | | | 585 | | | |
| 5A6 | | 0 | D | 0 | 0 | 0 | 0 | 20 | 1 | | | | | | | 585 | | | |
| 5A7 | | A | 0 | 0 | 0 | 0 | 10 | 20 | 1 | | | | | | | 584 | | | |
| 5A8 | | 0 | D | 0 | 0 | 0 | 10 | 20 | 1 | | | | | | | 584 | | | |
| 5B1 | 01V1T4B7A1-4+Pume(2.2) | A | 0 | 0 | 0 | 0 | 0 | 0 | 1 | | | | | | | 581 | | | |
| 5B2 | | 0 | D | 0 | 0 | 0 | 0 | 0 | 1 | | | | | | | 581 | | | |
| 5B3 | | A | 0 | 0 | 0 | 0 | 10 | 0 | 1 | | | | | | | 580 | | | |
| 5B4 | | 0 | D | 0 | 0 | 0 | 10 | 0 | 1 | | | | | | | 580 | | | |
| 5B5 | | A | 0 | 0 | 0 | 0 | 0 | 20 | 1 | | | | | | | 578 | | | |
| 5B6 | | 0 | D | 0 | 0 | 0 | 0 | 20 | 1 | | | | | | | 578 | | | |
| 5B7 | | A | 0 | 0 | 0 | 0 | 10 | 20 | 1 | | | | | | | 579 | | | |
| 5B8 | | 0 | D | 0 | 0 | 0 | 10 | 20 | 1 | | | | | | | 579 | | | |

COEFFICIENTS:

a or b

SCHEDULES

IDPVAR(1) IDPVAR(2) INDV

TABLE 2. TEST

S-222

DATA SET COLLATION SHEET (CONTINUED)

RD76XX TANK @ TANK MRC
RD77XX ORBITER @ ORBITER MRC☐ PRETEST
☒ POSTTEST

| DATA SET IDENTIFIER | CONFIGURATION | SCHID. | | CONTROL DEFLECTION | | | NO. OF RUNS | MACH NUMBERS | | | | | | | | | | | |
|---------------------|---------------------|----------|---------|--------------------|-----|-----|-------------|--------------|-----|-----|------|------|-----|-----|-----|------|-----|-----|--|
| | | α | β | \$A | \$E | \$R | | 0.4 | 0.6 | 0.9 | 0.95 | 1.05 | 1.1 | 1.5 | 2.2 | 2.25 | 4.5 | | |
| RD7601 | T1 | A | 0 | - | - | - | 4 | | | | | | 105 | | 107 | | 190 | 193 | |
| 602 | T2 | A | 0 | - | - | - | 4 | | | 109 | | | 109 | | 108 | | 191 | 192 | |
| 603 | T3 | A | 0 | - | - | - | 4 | | | 110 | | | 111 | | 189 | | 194 | | |
| 604 | T4 | A | 0 | - | - | - | 6 | | 466 | 467 | | | 468 | 601 | 574 | | 603 | | |
| RD7701 | $\phi 1$ | C | 0 | 0 | 0 | 0 | 6 | | 126 | 127 | | | 128 | 181 | 180 | | 182 | | |
| 702 | \downarrow | C | 6 | 0 | 0 | 0 | 6 | | 155 | 154 | | | 153 | 156 | 157 | | 165 | | |
| 703 | \downarrow | C | 0 | 0 | 0 | 10 | 4 | | 131 | 130 | | | 129 | | 179 | | | | |
| 704 | $\phi 1 V 1$ | C | 0 | 0 | 0 | 0 | 3 | | | 139 | | | 140 | | 175 | | | | |
| 705 | \downarrow | C | 6 | 0 | 0 | 0 | 3 | | | 146 | | | 145 | | 160 | | | | |
| 706 | \downarrow | C | 0 | 0 | 0 | 10 | 1 | | | | | | | | 178 | | | | |
| 707 | $\phi 1 V \phi F F$ | C | 0 | 0 | 0 | - | 3 | | | 142 | | | 141 | | 174 | | | | |
| 708 | \downarrow | C | 6 | 0 | 0 | - | 3 | | | 143 | | | 144 | | 161 | | | | |
| 709 | $\phi 1 C 1$ | C | 0 | 0 | 0 | 0 | 5 | | 132 | 133 | | | 134 | | 177 | | 183 | | |
| 710 | \downarrow | C | 6 | 0 | 0 | 0 | 5 | | 152 | 151 | | | 150 | | 158 | | 163 | | |
| 711 | $\phi 1 C 2$ | C | 0 | 0 | 0 | 0 | 5 | | 137 | 136 | | | 135 | | 176 | | 184 | | |
| 712 | \downarrow | C | 6 | 0 | 0 | 0 | 5 | | 149 | 147 | | | 148 | | 159 | | 164 | | |

1 7 13 19 25 31 37 43 49 55 61 67 75.76

CN CY CA CAF CBL CLN CYN MACH ALPHA BETA 7

COEFFICIENTS: IDPVAR(1) IDPVAR(2) IDV

a or b

SCHEDULES

TABLE 2. TEST S-222 DATA SET COLLATION SHEET (CONTINUED)

BOOSTER @ BOOSTER MRC PITCH PLANE

☐ PRETEST
☒ POSTTEST

| DATA SET IDENTIFIER | CONFIGURATION | SCHD. | | CONTROL DEFLECTION | NO. OF RUNS | MACH NUMBERS | | | | | | | | | |
|---------------------|---------------|-------|---|--------------------|-------------|--------------|-----|-----|-----|------|-----|-----|-----|-----|-----|
| | | A | B | | | 0.4 | 0.6 | 0.7 | 0.9 | 0.95 | 1.1 | 1.5 | 2.2 | 2.5 | 4.5 |
| RD7801 | B1 | A | D | — | 4 | | | | 117 | | 116 | | 170 | | 169 |
| 802 | B2 | A | C | — | 4 | | | | 120 | | 121 | | 172 | | 166 |
| 803 | B2S | A | C | — | 4 | | | | 123 | | 122 | | 173 | | 167 |
| 804 | B3 | A | C | — | 4 | | | | 119 | | 118 | | 171 | | 168 |
| 805 | B4 | A | D | — | 4 | | | | 113 | | 112 | | 188 | | 195 |
| 806 | B1S1 | E | D | — | 6 | | | | 638 | | 639 | 612 | | 622 | 606 |
| 807 | B1S2 | E | D | — | 6 | | | | 642 | | 641 | 640 | 613 | 623 | 607 |
| 808 | B1D2 | E | D | 75 | 6 | | | 626 | | 627 | 628 | 609 | | 620 | 608 |
| 809 | B1D2 | F | D | 75 | 2 | | | | | | | | | 624 | 625 |
| 810 | B1D2 | E | D | 45 | 3 | | | | | 630 | 629 | | | 621 | |
| 811 | B1D6 | E | D | 75 | 6 | | | | | 632 | 631 | 610 | | 618 | 617 |
| 812 | B1D7 | E | D | 75 | 6 | | | 634 | | 635 | 636 | 611 | | 619 | 616 |

COEFFICIENTS:

CN. CY. CA. CAF. CBL. CLM. CYN. MACH. ALPHA. 7

α or β

F = 30° / 61°

SCHEDULES

IDPVAR(1) IDPVAR(2) NDV

☐ PRETEST
☒ POSTTEST

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TABLE 2. TEST S-222 DATA SET COLLATION SHEET (CONCLUDED)

RD79XX BOOSTER @ BOOSTER MRC YAW PLANE
 RD79AX BOOSTER @ TANK T1 MRC YAW PLANE
 RD79BX BOOSTER @ TANK T3 MRC YAW PLANE

☐ PRETEST
☒ POSTTEST

| DATA SET IDENTIFIER | CONFIGURATION | SCHUD. | | CONTROL | DEFLECTION | NO. OF RUNS | MACH NUMBERS | | | | | | | | | |
|---------------------|---------------|----------|---------|---------|------------|-------------|--------------|-----|-----|-----|--|--|--|--|--|--|
| | | α | β | SD | | | 0.9 | 1.1 | 2.2 | 4.5 | | | | | | |
| RD7901 | B1 | 0 | A | — | | 4 | 117 | 116 | 170 | 169 | | | | | | |
| 902 | B2 | 0 | A | — | | 4 | 120 | 121 | 172 | 166 | | | | | | |
| 903 | B2S | 0 | A | — | | 4 | 123 | 122 | 173 | 167 | | | | | | |
| 904 | B3 | 0 | A | — | | 4 | 119 | 118 | 171 | 168 | | | | | | |
| 905 | B4 | 0 | A | — | | 4 | 113 | 112 | 188 | 195 | | | | | | |
| | | | | | | | | | | | | | | | | |
| 9A1 | B1 | 0 | A | — | | 4 | 117 | 116 | 170 | 169 | | | | | | |
| 9A2 | B2 | 0 | A | — | | 4 | 120 | 121 | 172 | 166 | | | | | | |
| 9A3 | B2S | 0 | A | — | | 4 | 123 | 122 | 173 | 167 | | | | | | |
| 9A4 | B3 | 0 | A | — | | 4 | 119 | 118 | 171 | 168 | | | | | | |
| 9A5 | B4 | 0 | A | — | | 4 | 113 | 112 | 188 | 195 | | | | | | |
| | | | | | | | | | | | | | | | | |
| 9B1 | B1 | 0 | A | — | | 4 | 117 | 116 | 170 | 169 | | | | | | |
| 9B2 | B2 | 0 | A | — | | 4 | 120 | 121 | 172 | 166 | | | | | | |
| 9B3 | B2S | 0 | A | — | | 4 | 123 | 122 | 173 | 167 | | | | | | |
| 9B4 | B3 | 0 | A | — | | 4 | 119 | 118 | 171 | 168 | | | | | | |
| 9B5 | B4 | 0 | A | — | | 4 | 113 | 112 | 188 | 195 | | | | | | |

COEFFICIENTS:

CN CY CA CAE CBL CLM CYN

MACH BETA 7

α or β
 SCHEDULES

IDPVAR(1) IDPVAR(2) NDV

TABLE 3. MODEL COMPONENT DESCRIPTIONS

MODEL COMPONENT: BODY - B₁ , B₂

GENERAL DESCRIPTION: 040A Orbiter Body

B₁ INCLUDES CANOPY

B₂ WITHOUT CANOPY

DRAWING NUMBER: JLP SDD 9-24-71

DIMENSIONS:

| | <u>FULL-SCALE</u> | <u>MODEL SCALE</u> |
|----------------------|-----------------------------|------------------------------|
| Length, inch | <u>1315.</u> | <u>7.89</u> |
| Max. Width, inch | <u>204.</u> | <u>1.224</u> |
| Max. Depth , inch | <u>238.</u> | <u>1.427</u> |
| Fineness Ratio | <u>7.07</u> | <u>7.07</u> |
| AreaS, inch | | |
| Max. Cross-Sectional | <u>306.2 ft²</u> | <u>1.590 in.²</u> |
| Planform | <u>1676. ft²</u> | <u>8.68 in.²</u> |
| Wetted | <u>6530. ft²</u> | <u>33.8 in.²</u> |
| Base | <u>298. ft²</u> | <u>1.546 in.²</u> |

TABLE 3. (CONTINUED)

MODEL COMPONENT: WING, W1GENERAL DESCRIPTION: 040A Orbiter clipped delta wingDRAWING NUMBER: JLP SDD 9-24-71DIMENSIONS:FULL-SCALEMODEL SCALETOTAL DATA, INCLUDES ELEVONS

| | | |
|-----------------------------|------------------------|------------------------|
| Area | | |
| Planform | 3155.3 ft ² | 16.37 in. ² |
| Wetted | 5360. ft ² | 27.8 in. ² |
| Span (equivalent), inch | 882. | 5.292 |
| Aspect Ratio | 1.712 | 1.712 |
| Rate of Taper | -- | -- |
| Taper Ratio | .1486 | .1486 |
| Diehedral Angle, degrees | 7.0 | 7.0 |
| Incidence Angle, degrees | 1.5 | 1.5 |
| Aerodynamic Twist, degrees | 0 | 0 |
| Toe-In Angle | -- | -- |
| Cant Angle | -- | -- |
| Sweep Back Angles, degrees | | |
| Leading Edge | 60. | 60. |
| Trailing Edge | 0 | 0 |
| 0.25 Element Line | 52.4 | 52.4 |
| Chords: inch | | |
| Root (Wing Sta. 0.0) | 897. | 5.38 |
| Tip, (equivalent) (Y = 441) | 133.3 | .800 |
| MAC | 609.5 | 3.657 |
| Fus. Sta. of .25 MAC | X 1057.5 | 6.36 |
| W.P. of .25 MAC | Z 302.3 | 1.812 |
| B.L. of .25 MAC | Y 165.7 | .996 |
| Airfoil Section | | |
| Root | NACA 0008-64 | NACA 0008-64 |
| Tip | NACA 0008-64 | NACA 0008-64 |

EXPOSED DATA, INCLUDES ELEVONS

| | | |
|--------------------------|-----------------------|------------------------|
| Area | 2010. ft ² | 14.45 in. ² |
| Span, (equivalent), inch | 678. | 4.07 |
| Aspect Ratio | 1.590 | 1.590 |
| Taper Ratio | .1850 | .1850 |
| Chords, inch | | |
| Root (Y102) | 720. | 4.32 |
| Tip (Y441) | 133.3 | .800 |
| MAC | 494. | 2.97 |
| Fus. Sta. of .25 MAC | X 1145.5 | 6.87 |
| W.P. of .25 MAC | Z 308.1 | 1.87 |
| B.L. of .25 MAC | Y 232.8 | 1.397 |

TABLE 3. (CONTINUED)

MODEL COMPONENT: ELEVONSGENERAL DESCRIPTION: _____

_____DRAWING NUMBER:JLP SDD 9-24-71DIMENSIONS: (FOR BOTH ELEVONS)FULL-SCALEMODEL SCALE

Area

456. ft²2.36 in.²

Span (equivalent), INCH

556.3.33

Inb'd equivalent chord, INCH

118..708

Outb'd equivalent chord, INCH

118..708Ratio movable surface chord/
total surface chord

At Inb'd equiv. chord

.1662.1662

At Outb'd equiv. chord

.517.517

Sweep Back Angles, degrees

Leading Edge

00

Tailing Edge

00

Hingeline

00

Area Moment (Normal to hinge line)

2240. ft³.835 in.²

TABLE 3. (CONTINUED)

MODEL COMPONENT: VERTICAL FIN, V1GENERAL DESCRIPTION: 040A Orbiter Vertical Fin. Both leading and trailing edges swept.DRAWING NUMBER: JLP SDD 9-24-71DIMENSIONS:FULL-SCALEMODEL SCALETOTAL DATA, INCLUDES RUDDER, EXCLUDES TIP POD

Area

Planform

342. ft²1.772 in.²

Wetted

684. ft²3.55 in.²

Span (equivalent)

246.2

1.480

Aspect Ratio

1.228

1.228

Rate of Taper

--

--

Taper Ratio

.374

.374

Dihedral Angle, degrees

--

--

Incidence Angle, degrees

0

0

Aerodynamic Twist, degrees

0

0

Toe-In Angle

--

--

Cant Angle

--

--

Sweep Back Angles, degrees

Leading Edge

45.

45.

Trailing Edge

15.

15.

0.25 Element Line

40.75

40.75

Chords: INCH

Root (Wing Section) (Z 500)

291.6

1.750

Tip, (equivalent) (Z 746.2)

109.0

.654

MAC

214.0

1.284

Fus. Sta. of .25 MAC

X 1422.7

--

W.P. of .25 MAC

Z 604.2

--

B.L. of .25 MAC

0

--

Airfoil Section

Root

NACA 0012-64

NACA 0012-64

Tip

4 " "

" " "

EXPOSED DATA

Area

Span, (equivalent)

Aspect Ratio

Taper Ratio

Chords

Root

Tip

MAC

Fus. Sta. of .25 MAC

W.P. of .25 MAC

B.L. of .25 MAC

SAME
AS
ABOVE

TABLE 3. (CONTINUED)

MODEL COMPONENT: RUDDER- R1GENERAL DESCRIPTION: _____

DRAWING NUMBER: _____

JLP SDD 9-24-71DIMENSIONS:FULL-SCALEMODEL SCALE

| | | |
|---|-----------------------------|-----------------------------|
| Area | <u>135.6 ft²</u> | <u>.702 in.²</u> |
| Span (equivalent), INCH | <u>246.3</u> | <u>1.475</u> |
| Inb'd equivalent chord, INCH | <u>115.</u> | <u>.690</u> |
| Outb'd equivalent chord, INCH | <u>43.8</u> | <u>.263</u> |
| Ratio movable surface chord/ total surface chord | | |
| At Inb'd equiv. chord | <u>.40</u> | <u>.40</u> |
| At Outb'd equiv. chord | <u>.40</u> | <u>.40</u> |
| Sweep Back Angles, degrees | | |
| Leading Edge | <u>29.1</u> | <u>29.1</u> |
| Tailing Edge | <u>15.0</u> | <u>15.0</u> |
| Hingeline | <u>29.1</u> | <u>29.1</u> |
| Area Moment (Normal to hinge line) | <u>448. ft³</u> | <u>.145 in.³</u> |

TABLE 3. (CONTINUED)

MODEL COMPONENT: VERTICAL TAIL - V2GENERAL DESCRIPTION: Centerline StabilizerDRAWING NUMBER:NRDIMENSIONS:FULL-SCALEMODEL SCALETOTAL DATA

Area

Planform

Wetted

Span (equivalent)

Aspect Ratio

Rate of Taper

Taper Ratio

Dihedral Angle, degrees

Incidence Angle, degrees

Aerodynamic Twist, degrees

Toe-In Angle

Cant Angle

Sweep Back Angles, degrees

Leading Edge

Trailing Edge

0.25 Element Line

Chords:

Root (Wing Sta. 0.0)

Tip, (equivalent)

MAC

Fus. Sta. of .25 MAC

W.P. of .25 MAC

B.L. of .25 MAC

Airfoil Section

Root

Tip

EXPOSED DATA

Area

Span, (equivalent)

Aspect Ratio

Taper Ratio

Chords

Root

Tip

MAC

Fus. Sta. of .25 MAC

W.P. of .25 MAC

B.L. of .25 MAC

69,837.3 in²2.514 in²

369.17 in

2.215 in

1.95

1.95

0.3137

.3137

288.0 in

1.728 in

90.35 in

0.542 in

206.38 in

1.238 in

1469.04

8.814

652.44

3.915

0

0

TABLE 3. (CONTINUED)

MODEL COMPONENT: RUDDER R₂

GENERAL DESCRIPTION: _____

DRAWING NUMBER: _____

DIMENSIONS:

| | <u>FULL-SCALE</u> | <u>MODEL SCALE</u> |
|---|---------------------------|----------------------------|
| Area | <u>181 ft²</u> | <u>.939 in²</u> |
| Span (equivalent) | <u>346 in</u> | <u>2.073 in</u> |
| Inb'd equivalent chord | <u>115 in</u> | <u>.691 in</u> |
| Outb'd equivalent chord | <u>36 in</u> | <u>.217 in</u> |
| Ratio Elevator chord/horizontal tail chord | | |
| At Inb'd equiv. chord | <u>.40</u> | <u>.40</u> |
| At Outb'd equiv. chord | <u>.40</u> | <u>.40</u> |
| Sweep Back Angles, degrees | | |
| Leading Edge | <u>32°</u> | <u>32°</u> |
| Tailing Edge | <u>21°</u> | <u>21°</u> |
| Hingeline | <u>32°</u> | <u>32°</u> |
| Area Moment (Normal to hinge line) | <u>569 ft³</u> | <u>.212 in³</u> |

TABLE 3. (CONTINUED)

MODEL COMPONENT: BODY - ACPS ENGINE POD P1

GENERAL DESCRIPTION: Blunt pod mounted on both wing tips.

DRAWING NUMBER: JLP SDD 9-24-71

DIMENSIONS:

| | <u>FULL-SCALE</u> | <u>MODEL SCALE</u> |
|-------------------------|-------------------|--------------------|
| Length, inch | <u>165.</u> | <u>.990</u> |
| Max. Width, inch | <u>55.</u> | <u>.330</u> |
| Max. Depth, inch | <u>28.</u> | <u>.168</u> |
| Fineness Ratio | <u>--</u> | <u>--</u> |
| Areas, in. ² | | |
| Max. Cross-Sectional | <u>1540.</u> | <u>.0555</u> |
| Planform | <u>8280.</u> | <u>.298</u> |
| Wetted | <u>15,800.</u> | <u>.568</u> |
| Base | <u>1540.</u> | <u>.0555</u> |

TABLE 3. (CONTINUED)

MODEL COMPONENT: BODY - OMS ENGINE POD, MIGENERAL DESCRIPTION: Pods mounted on both sides of aft end of fuselage.DRAWING NUMBER:JLP SDD 9-24-71DIMENSIONS:FULL-SCALEMODEL SCALE

Length, inch

251.1.509

Max. Width, inch

42.8.257

Max. Depth, inch

59.0.354

Fineness Ratio

----Areas, in.²

Max. Cross-Sectional

1828..0658

Planform

9880..356

Wetted

25,400..915

Base

1807..0651

TABLE 3. (CONTINUED)

MODEL COMPONENT: BODY - HO Tank - T₂

GENERAL DESCRIPTION: _____

Blunt cone-cylinder centerline tank with aft boat tail. $\theta_{\text{cone}} = 10^\circ$. Nose radius = 22 in. full-scale.Diameter at base = 274 in. full-scale.DRAWING NUMBER: _____DIMENSIONS:FULL-SCALEMODEL SCALE

Length

2022 in.12.133 in.

Max. Width

301 in.1.806 in.

Dia.

Max. Depth

301 in.1.806 in.

Fineness Ratio

6.736.73

Area

Max. Cross-Sectional

494 ft²2.562 in.²

Planform

Wetted

Base

422 ft²2.125 in.²

TABLE 3. (CONTINUED)

MODEL COMPONENT: BODY - HO Tank - T₁

GENERAL DESCRIPTION: _____

Blunt cone-cylinder centerline tank with aft boat tail. $\theta_{\text{cone}} = 15^\circ$. Nose radius = 22 in. full-scale.Diameter at base = 274 in. full-scale.DRAWING NUMBER: _____DIMENSIONS:FULL-SCALEMODEL SCALE

Length

1867 in.11.205 in.

Max. Width

301 in.1.806 in.

Dia.

Max. Depth

301 in.1.806 in.

Fineness Ratio

6.26.2

Area

Max. Cross-Sectional

494 ft²2.562 in.²

Planform

Wetted

Base

422 ft²2.125 in.²

TABLE 3. (CONTINUED)

MODEL COMPONENT: BODY - HO Tank - T₃

GENERAL DESCRIPTION: _____

Blunt cone-cylinder centerline tank with aft boat tail. θ cone = 10°. Nose radius = 22 in. full-scale.Diameter at base = 304 in. full-scale.DRAWING NUMBER: _____DIMENSIONS:FULL-SCALEMODEL SCALE

Length

1914 in.11.442 in.

Max. Width

323.5 in.1.941 in.

Dia.

Max. Depth

323.5 in.1.941 in.

Fineness Ratio

5.925.92

Area

Max. Cross-Sectional

587 ft²2.959 in.²

Planform

Wetted

Base

518 ft²2.613 in.²

TABLE 3. (CONTINUED)

MODEL COMPONENT: BODY - HO-TANK-T₄GENERAL DESCRIPTION: Blunt Cone-Cylinder Centerline Tank with Aft Boat Tail $\theta_{\text{Cone}} = 20^\circ$. Nose Radius = 22 In. Full-Scale. Maximum Diameter = 334 In.Full Scale.DRAWING NUMBER: _____DIMENSIONS:FULL-SCALEMODEL SCALE

Length

1700 In.10.200 In.

Max. Width

334 In.2.004 In.

Dia.

Max. Depth

334 In.2.004 In.

Fineness Ratio

5.095.09

Area

Max. Cross-Sectional

608 Ft.²3.154 In.²

Planform

Wetted

Base

537 Ft.²2.785 In.²

TABLE 3. (CONTINUED)

MODEL COMPONENT: TANK VENTRAL FIN, F₁GENERAL DESCRIPTION: Single Fin Mounted on Tank, T₄Fin has no movable surface.

DRAWING NUMBER: _____

| <u>DIMENSIONS:</u> | <u>FULL-SCALE</u> | <u>MODEL SCALE</u> |
|---|----------------------------|------------------------------|
| Area | <u>337 Ft.²</u> | <u>1.747 In.²</u> |
| Span (equivalent) | <u>237 In.</u> | <u>1.420 In.</u> |
| Inb'd equivalent chord | <u>323 In.</u> | <u>1.940 In.</u> |
| Outb'd equivalent chord | <u>87 In.</u> | <u>0.520 In.</u> |
| Ratio Elevator chord/horizontal tail chord | | |
| At Inb'd equiv. chord | <u>---</u> | <u>---</u> |
| At Outb'd equiv. chord | <u>---</u> | <u>---</u> |
| Sweep Back Angles, degrees | | |
| Leading Edge | <u>45</u> | <u>45</u> |
| Tailing Edge | <u>0</u> | <u>0</u> |
| Hingeline | <u>---</u> | <u>---</u> |
| Area Moment (Normal to hinge line) | <u>---</u> | <u>---</u> |

TABLE 3. (CONTINUED)

MODEL COMPONENT: BODY - Booster, B₇

GENERAL DESCRIPTION: Parallel burn version of recoverable pressure-fed booster (RPFB). Blunt cone-cylinder with afterbody flare. $\theta_{\text{cone}} = 20^\circ$. $\theta_{\text{flare}} = 15^\circ$.

Nose radius = 22 in. full-scale.

DRAWING NUMBER: _____

| <u>DIMENSIONS:</u> | <u>FULL-SCALE</u> | <u>MODEL SCALE</u> |
|------------------------|---------------------------|------------------------------|
| Length | <u>1799 in.</u> | <u>10.792 in.</u> |
| Dia. Body | <u>206 in.</u> | <u>1.236 in.</u> |
| Max. Dia. Flare | <u>402 in.</u> | <u>2.412 in.</u> |
| Fineness Ratio | <u>8.73</u> | <u>8.73</u> |
| Area | | |
| Cross-Sectional (Body) | <u>231 ft²</u> | <u>1.200 in.²</u> |
| Planform | <u>---</u> | <u>---</u> |
| Wetted | <u>---</u> | <u>---</u> |
| Base (flare) | <u>901 ft²</u> | <u>4.539 in.²</u> |

TABLE 3. (CONTINUED)

MODEL COMPONENT: CODY - Booster, B SGENERAL DESCRIPTION: Pressure-Fed BoosterDRAWING NUMBER: _____

| <u>DIMENSIONS:</u> | <u>FULL-SCALE</u> | <u>MODEL SCALE</u> |
|-----------------------------|----------------------------|--------------------------------|
| Length | <u>1799 In.</u> | <u>10.792 In.</u> |
| Dia. Body | <u>206 In.</u> | <u>1.236 In.</u> |
| Max. Dia. Flare | <u>624 In.</u> | <u>3.744 In.</u> |
| Fineness Ratio | <u>8.73</u> | <u>8.73</u> |
| Area | | |
| Max. Cross-Sectional (Body) | <u>231 Ft²</u> | <u>1.200 In.²</u> |
| Planform | <u>---</u> | <u>---</u> |
| Wetted | <u>---</u> | <u>---</u> |
| Base (Flare) | <u>2125 Ft²</u> | <u>11.0093 In.²</u> |

TABLE 3.. (CONTINUED)

MODEL COMPONENT: CODY - Booster, B₁S₂GENERAL DESCRIPTION: Pressure-Fed BoosterDRAWING NUMBER: _____DIMENSIONS:FULL-SCALEMODEL SCALE

Length

1799 In.10.792 In.

Dia. Body

206 In.1.236 In.

Max. Dia. Flare

936.3 In.5.618 In.

Fineness Ratio

8.738.73

Area

Max. Cross-Sectional (Body)

231 Ft²1.200 In.²

Planform

Wetted

Base (Flare)

4785 Ft²24.7887 In.²

TABLE 3. (CONTINUED)

MODEL COMPONENT: BODY - Booster - B₂

GENERAL DESCRIPTION: _____

SRM Booster . Blunt cone-cylinder. θ cone = 20°. Nose radius = 16.67 in.
full-scale.

DRAWING NUMBER: _____

| <u>DIMENSIONS:</u> | <u>FULL-SCALE</u> | <u>MODEL SCALE</u> |
|----------------------|-----------------------------|------------------------------|
| Length | <u>1775 in.</u> | <u>10.633 in.</u> |
| Max. Width | <u>156 in.</u> | <u>0.936 in.</u> |
| Dia. | | |
| Max. Depth | <u>156 in.</u> | <u>0.936 in.</u> |
| Fineness Ratio | <u>11.37</u> | <u>11.37</u> |
| Area | | |
| Max. Cross-Sectional | <u>137.8 ft²</u> | <u>0.694 in.²</u> |
| Planform | <u>---</u> | <u>---</u> |
| Wetted | <u>---</u> | <u>---</u> |
| Base | <u>137.8 ft²</u> | <u>0.694 in.²</u> |

TABLE 3. (CONTINUED)

MODEL COMPONENT: BODY - Booster - B₂S

GENERAL DESCRIPTION: _____

SRM Booster , B₂ booster with 15° afterbody flare. Nose radius = 16.67
in. full-scale.

DRAWING NUMBER: _____

DIMENSIONS:FULL-SCALEMODEL SCALE

Length

1775 in.10.633 in.

Dia. Body

156 in.0.936 in.

Max. Dia. Flare

275 in.1.650 in.

Fineness Ratio

11.3711.37

Area

Cross Sectional (Body)

137.8 ft²0.694 in.²

Planform

Wetted

Base (Flare)

428 ft²2.158 in.²

TABLE 3. (CONTINUED)

MODEL COMPONENT: BODY - Booster - B₃GENERAL DESCRIPTION: Parallel burn version of recoverable pressure-fed booster (RPFB). Blunt cone-cylinder with afterbody flare. θ cone = 15°.Nose radius - 22 in. full-scale. θ Flare = 15°DRAWING NUMBER: _____DIMENSIONS:

| | <u>FULL-SCALE</u> | <u>MODEL SCALE</u> |
|------------------------|---------------------------|------------------------------|
| Length | <u>1800 in.</u> | <u>10.800 in.</u> |
| Dia. Body | <u>206 in.</u> | <u>1.236 in.</u> |
| Max. Dia. Flare | <u>402 in.</u> | <u>2.412 in.</u> |
| Fineness Ratio | <u>8.74</u> | <u>8.74</u> |
| Area | | |
| Cross-Sectional (Body) | <u>231 ft²</u> | <u>1.200 in.²</u> |
| Planform | <u>---</u> | <u>---</u> |
| Wetted | <u>---</u> | <u>---</u> |
| Base (Flare) | <u>902 ft²</u> | <u>4.545 in.²</u> |

TABLE 3. (CONTINUED)

MODEL COMPONENT: BODY - Booster - B₄

GENERAL DESCRIPTION: Parallel burn version of recoverable pressure-fed
booster (RPFB). Blunt cone-cylinder with afterbody flare. $\theta_{\text{cone}} = 20^\circ$.
 $\theta_{\text{flare}} = 5^\circ$. Nose radius = 22 in. full scale.

DRAWING NUMBER: _____DIMENSIONS:FULL-SCALEMODEL SCALE

| | | |
|------------------------|---------------------------|------------------------------|
| Length | <u>1503 in.</u> | <u>9.025 in.</u> |
| Dia. Body | <u>247 in.</u> | <u>1.483 in.</u> |
| Max. Dia. Flare | <u>318 in.</u> | <u>1.909 in.</u> |
| Fineness Ratio | <u>6.09</u> | <u>6.09</u> |
| Area | | |
| Cross-Sectional (Body) | <u>343 ft²</u> | <u>1.727 in.²</u> |
| Planform | <u>---</u> | <u>---</u> |
| Wetted | <u>---</u> | <u>---</u> |
| Base (Flare) | <u>568 ft²</u> | <u>2.865 in.²</u> |

TABLE 3. (CONTINUED)

MODEL COMPONENT: Fin, F₄GENERAL DESCRIPTION: Single fin mounted on each B₄ booster flare.Roll-out angle is 45° down. Fin has no movable surface.

DRAWING NUMBER: _____

| <u>DIMENSIONS:</u> | <u>FULL-SCALE</u> | <u>MODEL SCALE</u> |
|---|---------------------------|-----------------------------|
| Area (exposed planform, 1 fin) | <u>503 ft²</u> | <u>2.610 in²</u> |
| Span (equivalent, to booster C ₄) | <u>424 in</u> | <u>2.544 in</u> |
| Inb'd equivalent chord | <u>410 in</u> | <u>2.460 in</u> |
| Outb'd equivalent chord | <u>110 in</u> | <u>0.660 in</u> |
| Ratio Elevator chord/horizontal tail chord | | |
| At Inb'd equiv. chord | <u>---</u> | <u>---</u> |
| At Outb'd equiv. chord | <u>---</u> | <u>---</u> |
| Sweep Back Angles, degrees | | |
| Leading Edge | <u>45</u> | <u>45</u> |
| Tailing Edge | <u>0</u> | <u>0</u> |
| Hingeline | <u>---</u> | <u>---</u> |
| Area Moment (Normal to hinge line) | <u>---</u> | <u>---</u> |

TABLE 3. (CONTINUED)

MODEL COMPONENT: BODY - Booster, B₅GENERAL DESCRIPTION: Pressure-Fed BoosterDRAWING NUMBER: _____DIMENSIONS:FULL-SCALEMODEL SCALE

Length

1799 In.10.792 In.

Dia. Body

206 In.1.236 In.

Max. Dia. Flare

319.3 In.1.916 In.

Fineness Ratio

8.738.73

Area

Max. Cross-Sectional (Body)

231 Ft²1.200 In.²

Planform

Wetted

Base (Flare)

557 Ft²2.88 In.²

TABLE 3. (CONTINUED)

MODEL COMPONENT: BODY - Booster, B6

GENERAL DESCRIPTION: SRM Booster

DRAWING NUMBER _____

| <u>DIMENSION:</u> | <u>FULL SCALE</u> | <u>MODEL SCALE</u> |
|---------------------|-----------------------------|-----------------------------|
| Length | <u>1613 in.</u> | <u>9.673 in.</u> |
| Dia. (Body) | <u>156 in.</u> | <u>0.936 in.</u> |
| Max Depth | <u>156 in.</u> | <u>0.936 in.</u> |
| Fineness Ratio | <u>10.35</u> | <u>10.35</u> |
| Area | | |
| Max Cross-Sectional | <u>137.8 ft²</u> | <u>0.694 in²</u> |
| Planform | <u>---</u> | <u>---</u> |
| Wetted | <u>---</u> | <u>---</u> |
| Base (Nozzle) | <u>95.4 ft²</u> | <u>0.481 in²</u> |

TABLE 3. (CONTINUED)

MODEL COMPONENT: BODY - Booster, B₇GENERAL DESCRIPTION: 120" Dia. SRMDRAWING NUMBER: _____DIMENSIONS:FULL-SCALEMODEL SCALE

Length

1403 In.8.418 In.

Dia. Body

120 In.0.72 In.

Max. Dia. Flare

Fineness Ratio

11.711.7

Area

Max. Cross-Sectional (Body)

79.3 Ft²0.408 In.²

Planform

Wetted

Base

79.3 Ft²0.408 In.²

TABLE 3. (CONCLUDED)

MODEL COMPONENT: BODY - TVC Tank A1 for B₇

GENERAL DESCRIPTION: Thrust Vectoring Fuel Tank

DRAWING NUMBER: _____

| <u>DIMENSIONS:</u> | <u>FULL-SCALE</u> | <u>MODEL SCALE</u> |
|-----------------------------|----------------------------|-----------------------------|
| Length | <u>381.8 In.</u> | <u>2.291 In.</u> |
| Dia. Body | <u>42 In.</u> | <u>0.252 In.</u> |
| Max. Dia. Flare | <u>---</u> | <u>---</u> |
| Fineness Ratio | <u>9.08</u> | <u>9.08</u> |
| Area | | |
| Max. Cross-Sectional (Body) | <u>9.65 Ft²</u> | <u>0.05 In.²</u> |
| Planform | <u>---</u> | <u>---</u> |
| Wetted | <u>---</u> | <u>---</u> |
| Base | <u>---</u> | <u>---</u> |

TABLE 4.
Plume Definition

M = 1.5

| $\frac{B_1}{r_e = 187 \text{ in.}}$ | | $\frac{B_6}{r_e = 66 \text{ in.}}$ | | $\frac{O_1 (3 \text{ Eng. -HiPc})}{r_e = 92.5 \text{ in.}}$ | |
|-------------------------------------|------------------|------------------------------------|------------------|---|------------------|
| x/r _e | r/r _e | x/r _e | r/r _e | x/r _e | r/r _e |
| 0 | 1.00 | 0 | 1.00 | 0 | 1.0 |
| 0.5 | 1.17 | 0.5 | 1.23 | 0.5 | 1.0 |
| 1.0 | 1.22 | 1.0 | 1.48 | 1.0 | 1.0 |
| 1.5 | 1.23 | 1.5 | 1.70 | 1.5 | 1.0 |
| 2.0 | 1.20 | 2.0 | 1.88 | 2.0 | 1.0 |
| | | 2.5 | 2.00 | | |
| | | 3.0 | 2.11 | | |

M = 2.2

| $\frac{B_6}{r_e = 66 \text{ in.}}$ | | $\frac{O_1 (3 \text{ Eng. -HiPc})}{r_e = 118 \text{ in.}}$ | |
|------------------------------------|------------------|--|------------------|
| x/r _e | r/r _e | x/r _e | r/r _e |
| 0 | 1.00 | 0 | 1.00 |
| 0.5 | 1.33 | 0.5 | 1.10 |
| 1.0 | 1.62 | 1.0 | 1.20 |
| 1.5 | 1.88 | 1.5 | 1.26 |
| 2.0 | 2.13 | 2.0 | 1.33 |
| 2.5 | 2.33 | 2.5 | 1.41 |
| 3.0 | 2.51 | 3.0 | 1.47 |
| 4.0 | 2.84 | 4.0 | 1.57 |
| 5.0 | 3.12 | 5.0 | 1.62 |
| 6.0 | 3.35 | 6.0 | 1.65 |
| 7.0 | 3.55 | 7.0 | 1.66 |
| 8.0 | 3.72 | 8.0 | 1.64 |
| 9.0 | 3.87 | | |
| 10.0 | 3.97 | | |
| 11.0 | 4.03 | | |
| 12.0 | 4.11 | | |
| 13.0 | 4.15 | | |
| 14.0 | 4.17 | | |

TABLE 4, cont.

M = 2.5

| $\frac{B_1}{r_e} = 187 \text{ in.}$ | | $\frac{O_1 (4 \text{ Eng. - J2S})}{r_e} = 89 \text{ in.}$ | |
|-------------------------------------|------------------|---|------------------|
| x/r _e | r/r _e | x/r _e | r/r _e |
| 0 | 1.00 | 0 | 1.00 |
| 0.5 | 1.34 | 0.5 | 1.21 |
| 1.0 | 1.53 | 1.0 | 1.34 |
| 1.5 | 1.77 | 1.5 | 1.46 |
| 2.0 | 1.91 | 2.0 | 1.56 |
| 2.5 | 2.03 | 2.5 | 1.61 |
| 3.0 | 2.13 | 3.0 | 1.67 |
| 4.0 | 2.30 | 4.0 | 1.71 |
| 5.0 | 2.30 | 5.0 | 1.75 |
| 6.0 | 2.23 | | |

B7

M = 1.5

| $r_e = 60 \text{ in.}$ | |
|------------------------|------------------|
| x/r _e | r/r _e |
| 0 | 1.00 |
| 0.026 | 1.01 |
| 0.100 | 1.05 |
| 0.240 | 1.10 |
| 0.320 | 1.14 |
| 0.430 | 1.18 |
| 0.680 | 1.27 |
| 1.000 | 1.34 |
| 1.400 | 1.50 |
| 1.870 | 1.61 |
| 2.430 | 1.72 |
| 3.410 | 1.87 |
| 4.150 | 1.94 |
| 4.970 | 1.98 |
| 5.830 | 2.00 |

M = 2.2

| $r_e = 60 \text{ in.}$ | |
|------------------------|------------------|
| x/r _e | r/r _e |
| 0 | 1.00 |
| 0.04 | 1.02 |
| 0.17 | 1.09 |
| 0.23 | 1.12 |
| 0.30 | 1.16 |
| 0.38 | 1.20 |
| 0.48 | 1.24 |
| 0.58 | 1.29 |
| 0.70 | 1.34 |
| 0.83 | 1.40 |
| 1.13 | 1.52 |
| 1.30 | 1.60 |
| 1.69 | 1.73 |
| 2.13 | 1.87 |
| 2.64 | 2.02 |
| 3.22 | 2.17 |
| 3.87 | 2.31 |
| 4.58 | 2.45 |
| 5.36 | 2.57 |

TABLE 5.
INDEX OF MODEL FIGURES

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| 28. | Centerline H0 Tank, T2 | 114 |
| 29. | Centerline H0 Tank, T3 | 115 |
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| TITLE | PLOTTED COEFFICIENTS SCHEDULE | CONDITIONS VARYING | VOLUME/ PAGE NO. |
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| Longitudinal Effects of a B1 Booster on (01)T1B1 at Beta = 0 | A | Ascent Configuration Booster Isolation | I/1-50 |
| Longitudinal Effects of a B1 Booster on (01)T1B1 at Beta = 6 | A | Ascent Configuration Booster Isolation | I/51-80 |
| Lateral-Directional Effects of a B1 Booster on (01)T1B1 at Beta = 0 | B | Ascent Configuration Booster Isolation | I/81-95 |
| Lateral-Directional Effects of a B1 Booster on (01)T1B1 at Beta = 6 | B | Ascent Configuration Booster Isolation | I/96-104 |
| Lateral-Directional Effects of a B1 Booster on (01)T1B1 with Beta at Alpha = 0 | D | Ascent Configuration Booster Isolation | I/105-110 |
| Longitudinal Effects of a B1 Booster on (01)T1B1 with Beta at Alpha = 0 | E | Ascent Configuration Booster Isolation | I/111-120 |
| Effect of Beta on Longitudinal Characteristics of 01T1B1 | A | Beta | I/121-180 |
| Effect of Beta on Lateral-Directional Characteristics of 01T1B1 | B | Beta | I/181-198 |
| Lateral-Directional Characteristics of Configuration 01T1B1 with Beta at Alpha = 0 | C | | I/199-218 |
| Aileron Effectiveness of Configuration (01)T1B1 at Beta = 0 | B | Aileron Deflection | I/219-236 |
| Aileron Effectiveness of Configuration 01T1B1 at Beta = 0 | B | Aileron Deflection | I/237-239 |
| Variation of Aileron Control at Alpha = 0 with Beta of 01T1B1 | C | Aileron Deflection | I/240-243 |
| Longitudinal Effects of a B2 Booster on (01)T1B2 at Beta = 6 | A | Ascent Configuration Booster Isolation | I/244-303 |

TABLE 6. (CONTINUED)

| TITLE | PICTURED COEFFICIENTS SCHEDULE | CONDITIONS VARYING | VOLUME/ PAGE NO. |
|---|--------------------------------------|---|---------------------|
| Lateral-Directional Effects of a B2 Booster on (01)TLB2 at Beta = 6 | B | Ascent Configuration Booster Isolation | I/304-309 |
| Effect of Beta on Longitudinal Characteristics of 01TLB2 | A | Beta | I/310-369 |
| Effect of Beta on Lateral-Directional Characteristics of 01TLB2 | B | Beta | I/370-387 |
| Effect of Beta on Longitudinal Characteristics of 01TLB2S | A | Beta | I/388-447 |
| Effect of Beta on Lateral-Directional Characteristics of 01TLB2S | B | Beta | I/448-465 |
| Longitudinal Effects of a B3 Booster on (01)TLB3 at Beta = 0 | A | Ascent Configuration Booster Isolation | I/466-525 |
| Longitudinal Effects of a B3 Booster on (01)TLB3 at Beta = 6 | A | Ascent Configuration Booster Isolation | I/526-545 |
| Lateral-Directional Effects of a B3 Booster on (01)TLB3 at Beta = 0 | B | Ascent Configuration Booster Isolation | I/546-557 |
| Lateral-Directional Effects of a B3 Booster on (01)TLB3 at Beta = 6 | B | Ascent Configuration Booster Isolation | I/558-563 |
| Lateral-Directional Effects of a B3 Booster on (01)TLB3 with Beta at Alpha = 0 | D | Ascent Configuration Booster Isolation | I/564-569 |
| Longitudinal Effects of a B3 Booster on (01)TLB3 with Beta at Alpha = 0 | E | Ascent Configuration Booster Isolation | I/570-579 |

TABLE 6. (CONTINUED)

| TITLE | PLOTTED COEFFICIENTS SCHEDULE | CONDITIONS VARYING | VOLUME/ PAGE NO. |
|---|-------------------------------------|---|---------------------|
| Longitudinal Effects of a B ₄ Booster on (01)TLB ₄ at Beta = 0 | A | Ascent Configuration Booster Isolation | I/580-639 |
| Longitudinal Effects of a B ₄ Booster on (01)TLB ₄ at Beta = 6 | A | Ascent Configuration Booster Isolation | I/640-659 |
| Lateral-Directional Effects of a B ₄ Booster on (01)TLB ₄ at Beta = 0 | B | Ascent Configuration Booster Isolation | I/660-674 |
| Lateral-Directional Effects of a B ₄ Booster on (01)TLB ₄ at Beta = 6 | B | Ascent Configuration Booster Isolation | I/675-680 |
| Lateral-Directional Effects of a B ₄ Booster on (01)TLB ₄ with Beta at Alpha = 0 | D | Ascent Configuration Booster Isolation | I/681-689 |
| Longitudinal Effects of a B ₄ Booster on (01)TLB ₄ with Beta at Alpha = 0 | E | Ascent Configuration Booster Isolation | I/690-704 |
| Longitudinal Effects of a B ₅ Booster on (01)TLB ₅ at Beta = 6 | A | Ascent Configuration Booster Isolation | I/705-724 |
| Lateral-Directional Effects of a B ₅ Booster on (01)TLB ₅ at Beta = 6 | B | Ascent Configuration Booster Isolation | I/725-730 |
| Longitudinal Effects of a B ₅ Booster on (01V1)TLB ₅ at Beta = 0 | A | Ascent Configuration Booster Isolation | I/731-790 |
| Longitudinal Effects of a B ₅ Booster on (01V1)TLB ₅ at Beta = 6 | A | Ascent Configuration Booster Isolation | I/791-800 |
| Lateral-Directional Effects of a B ₅ Booster on (01V1)TLB ₅ at Beta = 0 | B | Ascent Configuration Booster Isolation | I/801-812 |
| Lateral-Directional Effects of a B ₅ Booster on (01V1)TLB ₅ at Beta = 6 | B | Ascent Configuration Booster Isolation | I/813-815 |
| Lateral-Directional Effects of a B ₅ Booster on (01V1)TLB ₅ with Beta at Alpha = 0 | D | Ascent Configuration Booster Isolation | I/816-824 |

TABLE 6. (CONTINUED)

| TITLE | PLOTTED COEFFICIENTS SCHEDULE | CONDITIONS VARYING | VOLUME/ PAGE NO. |
|---|-------------------------------------|---|---------------------|
| Longitudinal Effects of a B5 Booster on (01V1)TLB5 with Beta at Alpha = 0 | E | Ascent Configuration Booster Isolation | I/825-839 |
| Longitudinal Characteristics of (01)TLB6 at Beta = 0 | A | Mach No. | I/840-849 |
| Lateral-Directional Characteristics of (01)TLB6 at Alpha = 0 | C | Mach No. | I/850-853 |
| Longitudinal Characteristics of (01)TLB6 with Allerons = 20 at Beta = 0 | A | Mach No. | I/854-863 |
| Lateral-Directional Characteristics of (01)TLB6 with Allerons = 20 at Beta = 0 | B | Mach No. | I/864-866 |
| Lateral-Directional Characteristics of (01)TLB6 with Allerons = 20 at Alpha = 0 | D | Mach No. | I/867-869 |
| Longitudinal Characteristics of (01)TLB6 with Allerons = 20 at Alpha = 0 | E | Mach No. | I/870-874 |
| Tank Nose Effect on Longitudinal Characteristics of Configuration (01)TLB1 at Beta = 0 | A | Configuration | I/875-904 |
| Longitudinal Effects of a B1 Booster on (01)TL2B1 at Beta = 6 | A | Ascent Configuration Booster Isolation | I/905-914 |
| Lateral-Directional Effects of a B1 Booster on (01)TL2B1 at Beta = 6 | B | Ascent Configuration Booster Isolation | I/915-917 |
| Tank Nose Cone Effect on Longitudinal Characteristics of Configuration (01V1)TLB5 at Beta = 0 | A | Configuration | I/918-947 |
| Tank Nose Cone Effect on Lateral-Directional Characteristics of Configuration (01V1)TLB5 at Alpha = 0 | C | Configuration | I/948-959 |

TABLE 6. (CONTINUED)

| TITLE | PLOTTED | | CONDITIONS VARYING | VOLUME/ PAGE NO. |
|--|--------------|----------|---|---------------------|
| | COEFFICIENTS | SCHEDULE | | |
| Effect of Tank T2 Longitudinal Position on (01)T2B1 at Beta = 0 | A | | Configuration | I/960-989 |
| Longitudinal Effects of a B1 Booster on (01)T2AB1 at Beta = 6 | A | | Ascent Configuration Booster Isolation | I/990-999 |
| Lateral-Directional Effects of a B1 Booster on (01)T2AB1 at Beta = 6 | B | | Ascent Configuration Booster Isolation | I/1000-1002 |
| Effect of Tank T2 Longitudinal Position on (01V1)T2B5 at Beta = 0 | A | | Configuration | I/1003-1032 |
| Effect of Tank T2 Longitudinal Position on (01V1)T2B5 at Beta = 0 | A | | Configuration | I/1033-1062 |
| Effect of Tank T2 Longitudinal Position on (01V1)T2B5 with Beta at Alpha = 0 | C | | Configuration | I/1063-1074 |
| Effect of Tank T2 Longitudinal Position on (01V1)T2B5 with Beta at Alpha = 0 | C | | Configuration | I/1075-1082 |
| Longitudinal Effects of a B1 Booster on (01)T3B1 at Beta = 0 | A | | Ascent Configuration Booster Isolation | II/1-40 |
| Longitudinal Effects of a B1 Booster on (01)T3B1 at Beta = 6 | A | | Ascent Configuration Booster Isolation | II/41-60 |
| Lateral-Directional Effects of a B1 Booster on (01)T3B1 at Beta = 0 | B | | Ascent Configuration Booster Isolation | II/61-72 |
| Lateral-Directional Effects of a B1 Booster on (01)T3B1 at Beta = 6 | B | | Ascent Configuration Booster Isolation | II/73-78 |
| Lateral-Directional Effects of a B1 Booster on (01)T3B1 with Beta at Alpha = 0 | D | | Ascent Configuration Booster Isolation | II/79-84 |

TABLE 6. (CONTINUED)

| TITLE | PLOTTED COEFFICIENTS SCHEDULE | CONDITIONS VARYING | VOLUME PAGE NO. |
|---|-------------------------------------|---|--------------------|
| Longitudinal Effects of a B1 Booster on (01)T3B1 with Beta at Alpha = 0 | E | Ascent Configuration Booster Isolation | II/85-99 |
| Longitudinal Effects of a B2 Booster on (01)T3B2 at Beta = 0 | A | Ascent Configuration Booster Isolation | II/100-139 |
| Lateral-Directional Effects of a B2 Booster on (01)T3B2 at Beta = 0 | B | Ascent Configuration Booster Isolation | II/140-151 |
| Lateral-Directional Effects of a B2 Booster on (01)T3B2 with Beta at Alpha = 0 | C | Ascent Configuration Booster Isolation | II/152-157 |
| Longitudinal Effects of a B2 Booster on (01)T3B2 with Beta at Alpha = 0 | E | Ascent Configuration Booster Isolation | II/158-167 |
| Longitudinal Characteristics of Configuration 01T3B2 at Beta = 0 | A | | II/168-177 |
| Longitudinal Characteristics of Configuration 01T3B2 at Beta = 6 | A | Mach No. | II/178-187 |
| Lateral-Directional Characteristics of Configuration 01T3B2 at Beta = 6 | B | Mach No. | II/188-190 |
| Longitudinal Effects of a B3 Booster on (01)T3B3 at Beta = 0 | A | Ascent Configuration Booster Isolation | II/191-230 |
| Longitudinal Effects of a B3 Booster on (01)T3B3 at Beta = 6 | A | Ascent Configuration Booster Isolation | II/231-240 |
| Lateral-Directional Effects of a B3 Booster on (01)T3B3 at Beta = 0 | B | Ascent Configuration Booster Isolation | II/241-252 |
| Lateral-Directional Effects of a B3 Booster on (01)T3B3 at Beta = 6 | B | Ascent Configuration Booster Isolation | II/253-255 |

TABLE 6. (CONTINUED)

| TITLE | PICTURED COEFFICIENTS SCHEDULE | CONDITIONS VARYING | VOLUME/ PAGE NO. |
|--|--------------------------------------|---|---------------------|
| Lateral-Directional Effects of a B3 Booster on (01)T3B3 with Beta at Alpha = 0 | D | Ascent Configuration Booster Isolation | II/256-261 |
| Longitudinal Effects of a B3 Booster on (01)T3B3 with Beta at Alpha = 0 | E | Ascent Configuration Booster Isolation | II/262-271 |
| B3 Boosters Contribution to Longitudinal Characteristics of (01)T3B3 at Beta = 0 | A | Configuration | II/272-321 |
| B3 Boosters Contribution to Lateral-Directional Characteristics of (01)T3B3 at Alpha = 0 | C | Configuration | II/322-333 |
| Effect of Beta on Longitudinal Characteristics of 01T3B4 | A | Beta | II/334-394 |
| Effect of Beta on Lateral-Directional Characteristics of 01T3B4 | B | Beta | II/394-411 |
| Lateral-Directional Characteristics of 01T3B4 with Beta at Alpha = 0 and 6 | C | Alpha | II/412-435 |
| Lateral-Directional Characteristics of Configuration (01)T3B4 with Beta at Alpha = 0 | C | | II/436-439 |
| Aileron Effectiveness of Configuration 01T3B4 at Beta = 0 | B | Aileron Deflection | II/440-457 |
| Aileron Effectiveness of Configuration (01)T3B4 at Beta = 0 | B | Aileron Deflection | II/458-460 |
| Effects of Alpha on Rudder Effectiveness of Configuration 01T3B4 at Beta = 0 | B | Rudder Deflection | II/461-478 |
| Effects of Alpha on Rudder Effectiveness of Configuration (01)T3B4 at Beta = 0 | B | Rudder Deflection | II/479-481 |
| Effect of Booster Fin F4 on Longitudinal Characteristics of 01T3B4 at Beta = 0 | A | Configuration | II/482-541 |

TABLE 6. (CONTINUED)

| TITLE | PLOTTED | | CONDITIONS VARYING | VOLUME/ PAGE NO. |
|---|--------------|----------|---|---------------------|
| | COEFFICIENTS | SCHEDULE | | |
| Effect of Booster Fin F ₄ on Longitudinal Characteristics of (01)T3B ₄ at Beta = 0 | A | | Configuration | II/542-551 |
| Effect of Booster Fin F ₄ on Longitudinal Characteristics of (01)T3B ₄ at Beta = 6 | A | | Configuration | II/552-611 |
| Effect of Booster Fin F ₄ on Lateral-Directional Characteristics of (01)T3B ₄ at Beta = 6 | B | | Configuration | II/612-629 |
| Longitudinal Effects of a B5 Booster on (01V1)T3B5 at Beta = 0 | A | | Ascent Configuration Booster Isolation | II/630-669 |
| Longitudinal Effects of a B5 Booster on (01V1)T3B5 at Beta = 6 | A | | Ascent Configuration Booster Isolation | II/670-679 |
| Lateral-Directional Effects of a B5 Booster on (01V1)T3B5 at Beta = 0 | B | | Ascent Configuration Booster Isolation | II/680-691 |
| Lateral-Directional Effects of a B5 Booster on (01V1)T3B5 at Beta = 6 | B | | Ascent Configuration Booster Isolation | II/692-694 |
| Lateral-Directional Effects of a B5 Booster on (01V1)T3B5 with Beta at Alpha = 0 | D | | Ascent Configuration Booster Isolation | II/695-700 |
| Longitudinal Effects of a B5 Booster on (01V1)T3B5 with Beta at Alpha = 0 | E | | Ascent Configuration Booster Isolation | II/701-710 |
| Effects of Beta on Longitudinal Characteristics of (01)T4B7A1-4 | A | | Beta | III/1-60 |
| Effects of Beta on Lateral-Directional Characteristics of (01)T4B7A1-4 | B | | Beta | III/61-78 |

TABLE 6. (CONTINUED)

| TITLE | PLOTTED COEFFICIENTS SCHEDULE | CONDITIONS VARYING | VOLUME/ PAGE NO. |
|--|-------------------------------------|-----------------------|---------------------|
| Longitudinal Characteristics of Configuration 01T ₄ B7A1-4 at Beta = 0 | A | Mach No. | III/79-88 |
| Lateral-Directional Characteristics of Configuration 01T ₄ B7A1-4 at Alpha = 0 | C | Mach No. | III/89-92 |
| Aileron Effectiveness of Configuration (01)T ₄ B7A1-4 at Beta = 0 | B | Aileron Deflection | III/93-110 |
| Aileron Effectiveness of Configuration (01)T ₄ B7A1-4 at Beta = 6 | B | Aileron Deflection | III/111-128 |
| Effects of Beta on Aileron Control of Configuration (01)T ₄ B7A1-4 at Alpha = 0 | C | Aileron Deflection | III/129-152 |
| Effects of Aileron on Longitudinal Characteristics of Configuration (01)T ₄ B7A1-4 at Beta = 6 | A | Aileron Deflection | III/153-212 |
| Effects of Alpha on Rudder Control of Configuration (01)T ₄ B7A1-4 at Beta = 0 | B | Rudder Deflection | III/213-230 |
| Rudder Effectiveness of Configuration (01)T ₄ B7A1-4 at Alpha = 0 | C | Rudder Deflection | III/231-254 |
| Effects of Beta on Lateral-Directional Characteristics of (01)T ₄ B7A1-4 with Rudder = 10 | B | Beta | III/255-272 |
| Effects of Alpha on Longitudinal Characteristics of (01)T ₄ B7A1-4 at Beta = 0 | A | Configuration | III/273-302 |
| Effects of Alpha on Lateral-Directional Characteristics of (01)T ₄ B7A1-4 at Alpha = 0 | C | Configuration | III/303-314 |
| Effects of Fin Fl on Longitudinal Characteristics of Configuration 01T ₄ B7A1-4 at Beta = 0 | A | Configuration | III/315-334 |

TABLE 6. (CONTINUED)

| TITLE | PLOTTED COEFFICIENTS SCHEDULE | CONDITIONS VARYING | VOLUME/ PAGE NO. |
|---|-------------------------------------|-----------------------|---------------------|
| Effects of Fin F1 on Lateral-Directional Characteristics on Configuration 01T ⁴ B7A1-4 at Alpha = 0 | C | Configuration | III/335-342 |
| Effects of Fin F1 on Longitudinal Characteristics of Configuration T ⁴ B7A1-4 at Beta = 0 | A | Configuration | III/343-402 |
| Effects of Fin F1 on Lateral-Directional Characteristics on Configuration T ⁴ B7A1-4 at Alpha = 0 | C | Configuration | III/403-426 |
| Effects of B7A1-4 on Longitudinal Characteristics of Configuration (01)T ⁴ B7A1-4 at Beta = 0 | A | Configuration | III/427-486 |
| Effects of B7A1-4 on Lateral-Directional Characteristics of Configuration (01)T ⁴ B7A1-1 at Alpha = 0 | C | Configuration | III/487-510 |
| Comparison of the Longitudinal Characteristics of (01)T ⁴ B7A1-4 and (01)T ⁴ B7A1-5 at Beta = 0 | A | Configuration | III/511-570 |
| Comparison of the Lateral-Directional Characteristics of (01)T ⁴ B7A1-4 and (01)T ⁴ B7A1-5 at Beta = 6 | B | Configuration | III/571-588 |
| Comparison of the Lateral-Directional Characteristics of (01)T ⁴ B7A1-4 and (01)T ⁴ B7A1-5 at Alpha = 0 | C | Configuration | III/589-612 |
| Effects of Beta on Longitudinal Characteristics of (01)T ⁴ B7A1-5 | A | Beta | III/613-672 |
| Effects of Beta on Lateral-Directional Characteristics of (01)T ⁴ B7A1-5 | B | Beta | III/673-690 |
| Longitudinal Effect of Exhaust Plumes on Configuration 01T1B1 at Beta = 0 | A | Plume | IV/ 1-20 |
| Longitudinal Effect of Exhaust Plumes on Configuration 01T1B1 at Beta = 6 | A | Plume | IV/21-30 |

TABLE 6. (CONTINUED)

| TITLE | PLOTTED COEFFICIENTS SCHEDULE | CONDITIONS VARYING | VOLUME/ PAGE NO. |
|---|-------------------------------------|---------------------------------|---------------------|
| Lateral-Directional Effect of Exhaust Plumes on Configuration 01T1B1 at Beta = 6 | B | Plume | IV/31-33 |
| Longitudinal Effect of M = 1.5 Exhaust Plumes on Configuration 01T1B1 at Beta = 0 | A | Plume | IV/34-53 |
| Lateral-Directional Effect of M=1.5 Exhaust Plumes on Configuration 01T1B1 at Alpha = 0 | C | Plume | IV/54-61 |
| Effect of Exhaust Plumes on Aileron Effectiveness of Configuration 01T1B1 on Beta = 0 | B | Plume | IV/62-64 |
| Effects of M=1.5 Exhaust Plumes on Aileron Effectiveness of Configuration 01T1B1 at Beta = 0 | B | Plume and Aileron Deflection | IV/65-70 |
| Variation of Aileron Control at Alpha = 0 with Beta and M=1.5 Exhaust Plumes 01T1B1 | C | Plume and Aileron Deflection | IV/71-78 |
| Variation of Rudder Control at Beta = 0 with Alpha and M=1.5 Exhaust Plumes 01T1B1 | B | Plume and Rudder Deflection | IV/79-84 |
| Effects of M=1.5 Exhaust Plumes on Rudder Effectiveness with Beta at Alpha = 0 of 01T1B1 | C | Plume and Rudder Deflection | IV/85-92 |
| Lateral-Directional Characteristics of Configuration 01T1B1 + Plume(2.5) with Deflected Rudder at Beta = 0 | B | | IV/93-95 |
| Longitudinal Characteristics of Configuration 01T1B1+Plume(2.5) with Deflected Rudder at Beta = 0 | A | | IV/96-105 |
| Longitudinal Effect of Mach No.=1.5 Exhaust Plumes on Configuration 01T3B6 at Beta = 0 | A | Plume | IV/106-115 |

TABLE 6. (CONTINUED)

| TITLE | PLOTTED | | CONDITIONS VARYING | VOLUME/ PAGE NO. |
|--|--------------|---------------------------------|-----------------------|---------------------|
| | COEFFICIENTS | SCHEDULE | | |
| Longitudinal Effect of Mach No=2.2 Exhaust Plumes on Configuration 01T3B6 at Beta = 0 | A | Plume | | IV/116-125 |
| Lateral-Directional Effect of Mach No.=1.5 Exhaust Plumes on Configuration 01T3B6 at Alpha = 0 | C | Plume | | IV/126-129 |
| Lateral-Directional Effect of Mach No=2.2 Exhaust Plumes on Configuration 01T3B6 at Alpha = 0 | C | Plume | | IV/130-133 |
| Effects of M=1.5 Exhaust Plumes on Aileron Effectiveness of Configuration 01T3B6 at Beta = 0 | B | Plume and Aileron Deflection | | IV/134-136 |
| Effects of M=2.2 Exhaust Plumes on Aileron Effectiveness of Configuration 01T3B6 at Beta = 0 | B | Plume and Aileron Deflection | | IV/137-139 |
| Variation of Aileron Control at Alpha = 0 with Beta and M=1.5 Exhaust Plumes 01T3B6 | C | Plume and Aileron Deflection | | IV/140-143 |
| Variation of Aileron Control at Alpha = 0 with Beta and M=2.2 Exhaust Plumes 01T3B6 | C | Plume and Aileron Deflection | | IV/144-147 |
| Variation of Rudder Control at Beta = 0 with Alpha and M=1.5 Exhaust Plumes 01T3B6 | B | Plume and Rudder Deflection | | IV/148-150 |
| Effects of M=1.5 Exhaust Plumes on Rudder Effectiveness with Beta at Alpha = 0 of 01T3B6 | C | Plume and Rudder Deflection | | IV/151-154 |
| Variation of Rudder Control at Beta = 0 with Alpha and M=2.2 Exhaust Plumes 01T3B6 | B | Plume and Rudder Deflection | | IV/155-157 |
| Effects of M=2.2 Exhaust Plumes on Rudder Effectiveness with Beta at Alpha = 0 of 01T3B6 | C | Plume and Rudder Deflection | | IV/158-161 |
| Longitudinal Effect of M=1.5 Exhaust Plumes on Configuration 01T4B7A1-4 at Beta = 0 | A | Plume | | IV/162-171 |

TABLE 6. (CONTINUED)

| TITLE | PLOTTED COEFFICIENTS SCHEDULE | CONDITIONS VARYING | VOLUME/ PAGE NO. |
|--|-------------------------------------|-----------------------|---------------------|
| Longitudinal Effect of M=2.2 Exhaust Plumes on Configuration 01T4B7A1-4 at Beta = 0 | A | Plume | IV/172-181 |
| Lateral-Directional Effects of M=1.5 Exhaust Plumes on Configuration 01T4B7A1-4 at Alpha = 0 | C | Plume | IV/182-185 |
| Lateral-Directional Effects of M=2.2 Exhaust Plumes on Configuration 01T4B7A1-4 at Alpha = 0 | C | Plume | IV/186-189 |
| Aileron Effectiveness of Configuration 01T4B7A1-4+Plume(1.5) at Beta = 0 | B | Aileron Deflection | IV/190-192 |
| Aileron Effectiveness of Configuration 01T4B7A1-4+Plume(2.2) at Beta = 0 | B | Aileron Deflection | IV/193-195 |
| Effects of Beta on Aileron Control of Configuration 01T4B7A1-4+Plume(1.5) at Alpha = 0 | C | Aileron Deflection | IV/196-199 |
| Effects of Beta on Aileron Control of Configuration 01T4B7A1-4+Plume(2.2) at Alpha = 0 | C | Aileron Deflection | IV/200-203 |
| Rudder Effectiveness of Configuration 01T4B7A1-4+Plume(1.5) at Alpha = 0 | C | Rudder Deflection | IV/204-207 |
| Rudder Effectiveness of Configuration 01T4B7A1-4+Plume(2.2) at Alpha = 0 | C | Rudder Deflection | IV/208-211 |
| Effects of Alpha on Rudder Control of Configuration 01T4B7A1-4+Plume(1.5) at Beta = 0 | B | Rudder Deflection | IV/212-214 |
| Effects of Alpha on Rudder Control of Configuration 01T4B7A1-4+Plume(2.2) at Beta = 0 | B | Rudder Deflection | IV/215-217 |

TABLE 6. (CONTINUED)

| TITLE | PLOTTED COEFFICIENTS SCHEDULE | CONDITIONS VARYING | VOLUME/ PAGE NO. |
|--|-------------------------------------|--|---------------------|
| Longitudinal Effects of M=1.5 Exhaust Plumes on Configuration O1V1T4B7A1-4 at Beta = 0 | A | Plume | IV/218-227 |
| Lateral-Directional Effects of M=1.5 Exhaust Plumes on Configuration O1V1T4B7A1-4 at Alpha = 0 | C | Plume | IV/228-231 |
| Longitudinal Effects of M=2.2 Exhaust Plumes on Configuration O1V1T4B7A1-4 at Beta = 0 | A | Plume | IV/232-241 |
| Lateral-Directional Effects of M=2.2 Exhaust Plumes on Configuration O1V1T4B7A1-4 at Alpha = 0 | C | Plume | IV/242-245 |
| Effects of M=1.5 Exhaust Plumes on Rudder Effectiveness with and without Rudder Flare | C | Plume, Rudder Deflection, Rudder Flare | IV/246-253 |
| Effects of M=2.2 Exhaust Plumes on Rudder Effectiveness with and without Rudder Flare | C | Plume, Rudder Deflection, Rudder Flare | IV/254-261 |
| Variation of Rudder Control with and without Rudder Flare and M=1.5 Exhaust Plume | A | Plume, Rudder Deflection, Rudder Flare | IV/262-281 |
| Variation of Rudder Control with and without Rudder Flare and M=2.2 Exhaust Plume | A | Plume, Rudder Deflection, Rudder Flare | IV/282-301 |
| Effects of Beta = 6 on Longitudinal Characteristics of Configuration (01)TL | A | Beta | IV/302-321 |
| Effects of Beta = 6 on Lateral-Directional Characteristics of Configuration (01)TL | B | Beta | IV/322-327 |
| Lateral-Directional Characteristics of V1 and V2 on (01)TL at Alpha = 0 | D | Configuration | IV/328-336 |
| Longitudinal Characteristics Comparison of V1 and V2 on (01)TL at Alpha = 0 | E | Configuration | IV/337-351 |

TABLE 6. (CONTINUED)

| TITLE | PIOTTED COEFFICIENTS SCHEDULE | CONDITIONS VARYING | VOLUME/ PAGE NO. |
|---|-------------------------------------|-----------------------|---------------------|
| Aileron Effectiveness of Configuration (01V1)T1 at Beta = 0 | B | Aileron Deflection | IV/352-360 |
| Effects of Beta on Aileron Effectiveness of Configuration (01V1)T1 at Alpha = 0 | D | Aileron Deflection | IV/361-369 |
| Longitudinal Characteristics of (01V1)T1 with Ailerons=20 at Beta = 0 | A | Mach No. | IV/370-379 |
| Lateral-Directional Characteristics of (01V1)T1 with Ailerons = 20 at Beta = 0 | B | Mach No. | IV/380-382 |
| Lateral-Directional Characteristics of (01V1)T1 with Ailerons = 20 at Alpha = 0 | D | Mach No. | IV/383-385 |
| Longitudinal Characteristics of (01V1)T1 with Ailerons=20 at Alpha = 0 | E | Mach No. | IV/386-390 |
| Rudder Effectiveness of Configuration (01V1)T1 at Alpha = 0 | C | Rudder Deflection | IV/391-402 |
| Effects of Alpha on Rudder Effectiveness of Configuration (01V1)T1 at Beta = 0 | B | Rudder Deflection | IV/403-411 |
| Effect of Tank T2 Longitudinal Position on (01)T2 at Beta=0 | A | Configuration | IV/412-431 |
| Effect of Tank T2 Longitudinal Position on (01)T2 with Beta at Alpha = 0 | C | Configuration | IV/432-439 |
| Longitudinal Characteristics of Various Boosters on Configuration (01)T2 at Beta = 6 | A | Configuration | IV/440-449 |
| Lateral-Directional Characteristics of Various Boosters on Configuration (01)T2 at Beta = 6 | B | Configuration | IV/450-452 |

TABLE 6. (CONTINUED)

| TITLE | PLOTTED COEFFICIENTS SCHEDULE | CONDITIONS VARYING | VOLUME/ PAGE NO. |
|--|-------------------------------------|-----------------------|---------------------|
| Effects of Beta = 6 on Longitudinal Characteristics of Configuration (01)T ₃ | A | Beta | IV/453-472 |
| Effects of Beta = 6 on Lateral-Directional Characteristics of Configuration (01)T ₃ | B | Beta | IV/473-478 |
| Effects of Beta on Longitudinal Characteristics of (01)T ₄ | A | Beta | IV/479-488 |
| Effects of Beta on Lateral-Directional Characteristics of (01)T ₄ | B | Beta | IV/489-491 |
| Longitudinal Characteristics of Configuration TLB ₅ at Beta = 0 | A | Mach No. | IV/492-501 |
| Lateral-Directional Characteristics of Configuration TLB ₅ at Alpha = 0 | C | Mach No. | IV/502-505 |
| Longitudinal Characteristics of Configuration TLB ₆ at Beta = 0 | A | Mach No. | IV/506-515 |
| Lateral-Directional Characteristics of Configuration TLB ₆ at Alpha = 0 | C | Mach No. | IV/516-519 |
| Longitudinal Characteristics of Configuration T3B ₂ at Beta = 0 | A | Mach No. | IV/520-529 |
| Lateral-Directional Characteristics of Configuration T3B ₂ at Alpha = 0 | C | Mach No. | IV/530-533 |
| Longitudinal Characteristics of Configuration T3B ₅ at Beta = 0 | A | Mach No. | IV/534-543 |
| Lateral-Directional Characteristics of Configuration T3B ₅ at Alpha = 0 | C | Mach No. | IV/544-547 |

TABLE 6. (CONTINUED)

| TITLE | PLOTTED | | CONDITIONS VARYING | VOLUME/ PAGE NO. |
|--|--------------|-------------------|-----------------------|---------------------|
| | COEFFICIENTS | SCHEDULE | | |
| Effects of Beta on Longitudinal Characteristics of 01 | A | Beta | | V/1-60 |
| Effects of Beta on Lateral-Directional Characteristics of 01 | B | Beta | | V/61-78 |
| Effects of Alpha on Rudder Effectiveness of Configuration 01 at Beta = 0 | B | Rudder Deflection | | V/79-90 |
| Effects of Alpha on Rudder Effectiveness of Configuration 01V1 | B | Rudder Deflection | | V/91-93 |
| Effects of Beta on Longitudinal Characteristics of 01V1 | A | Beta | | V/94-123 |
| Effects of Beta on Lateral-Directional Characteristics of 01V1 | B | Beta | | V/124-132 |
| Effects of Beta on Longitudinal Characteristics of 01 V Off | A | Beta | | V/133-162 |
| Effects of Beta on Lateral-Directional Characteristics of 01 V Off | B | Beta | | V/163-171 |
| Effects of Beta on Lateral-Directional Characteristics of 01C1 | B | Beta | | V/172-186 |
| Effects of Beta on Lateral-Directional Characteristics of 01C1 | B | Beta | | V/187-201 |
| Longitudinal Characteristics of Various Tanks at Beta = 0 | A | Configuration | | V/202-261 |
| Longitudinal Characteristics of Various Boosters Alone at Beta = 0 and Nominal MRC | A | Configuration | | V/262-301 |

TABLE 6. (CONTINUED)

| TITLE | PLOTTED COEFFICIENTS SCHEDULE | CONDITIONS VARYING | VOLUME/ PAGE NO. |
|---|-------------------------------------|-----------------------|---------------------|
| Longitudinal Characteristics of Various Boosters Alone at Beta = 0 and Tank 1 MRC | A | Configuration | V/302-341 |
| Longitudinal Characteristics of Various Boosters Alone at Beta = 0 and Tank 3 MRC | A | Configuration | V/342-381 |
| Lateral-Directional Characteristics of Various Boosters Alone at Beta = 0 and Tank 1 MRC | B | Configuration | V/382-393 |
| Lateral-Directional Characteristics of Various Boosters Alone at Beta = 0 and Tank 3 MRC | B | Configuration | V/394-405 |
| Lateral-Directional Characteristics of Various Boosters Alone at Alpha = 0 and Nominal MRC | C | Configuration | V/406-421 |
| Lateral-Directional Characteristics of Various Boosters Alone at Alpha = 0 and Tank 1 MRC | C | Configuration | V/422-437 |
| Lateral-Directional Characteristics of Various Boosters Alone at Alpha = 0 and Tank 3 MRC | C | Configuration | V/438-453 |
| Comparison of Longitudinal Characteristics of Booster B1 with Larger Aft Flares S | A | Configuration | V/454-523 |
| Comparison of Longitudinal Characteristics of Booster B1 with Flaps D2 at Various Deflection | A | Flap Deflection | V/524-583 |
| Comparison of Longitudinal Characteristics of Booster B1 with Various Flaps | A | Flap Deflection | V/584-643 |

TABLE 6. (CONCLUDED)

PLOTTED COEFFICIENTS SCHEDULE:

(A) - CN, CA, CAF, CIM, CL & CDF vs. ALPHA

CN & CL vs. CIM, CL & CLSQR vs. CDF

(B) - CY, CYN & CBL vs. ALPHA

(C) - CY, CYN, CBL & CAF vs. BETA

(D) - CY, CYN, CBL vs. BETA

(E) - CN, CAF, CIM, CL & CDF vs. BETA

Notes:

1. Positive directions of force coefficients moment coefficients, and angles are indicated by arrows.

2. For clarity, origins of wind and stability axes have been displaced from the center of gravity.

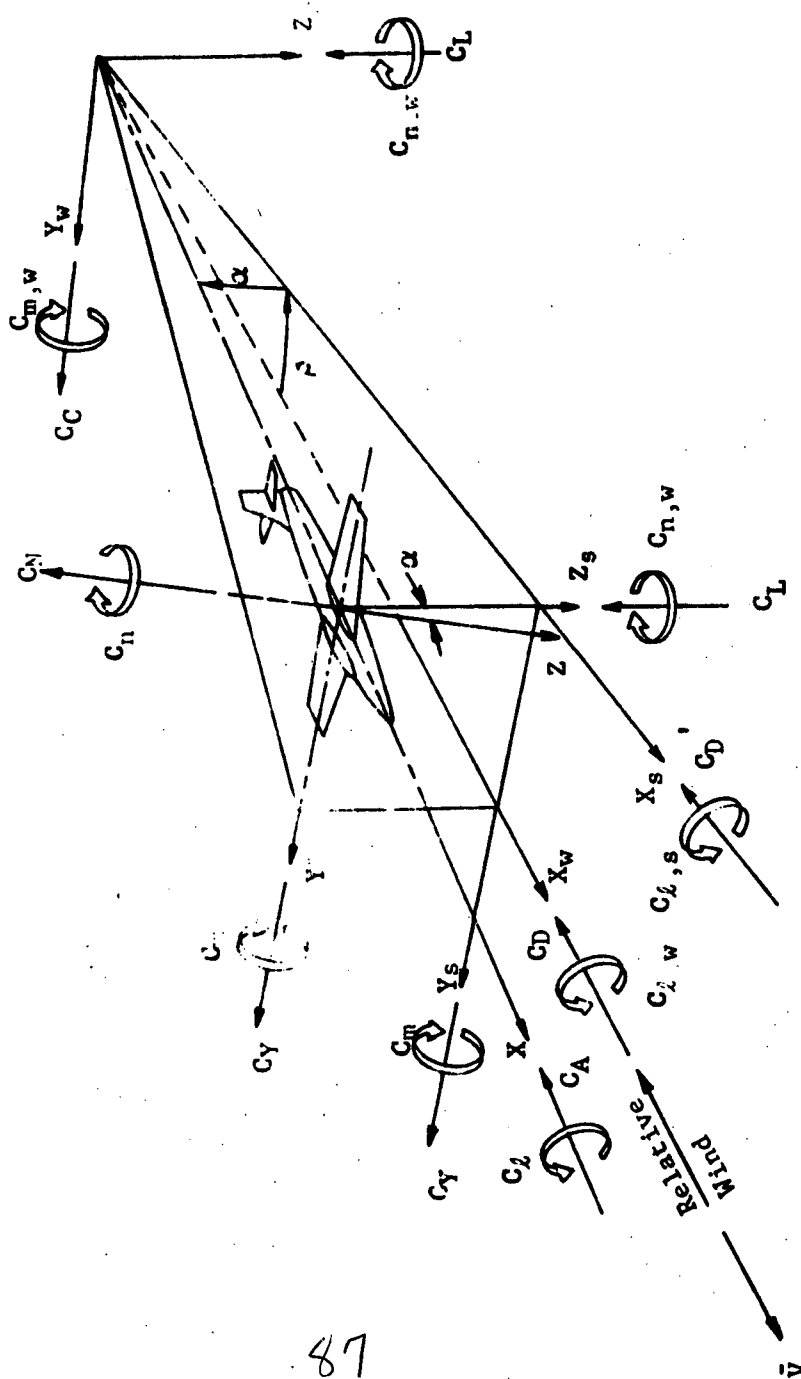


Figure 1. Axis systems, showing direction and sense of force and moment coefficients, angle of attack, and sideslip angle

Figure 2. Photograph of Configuration (01) F4B7A1-4

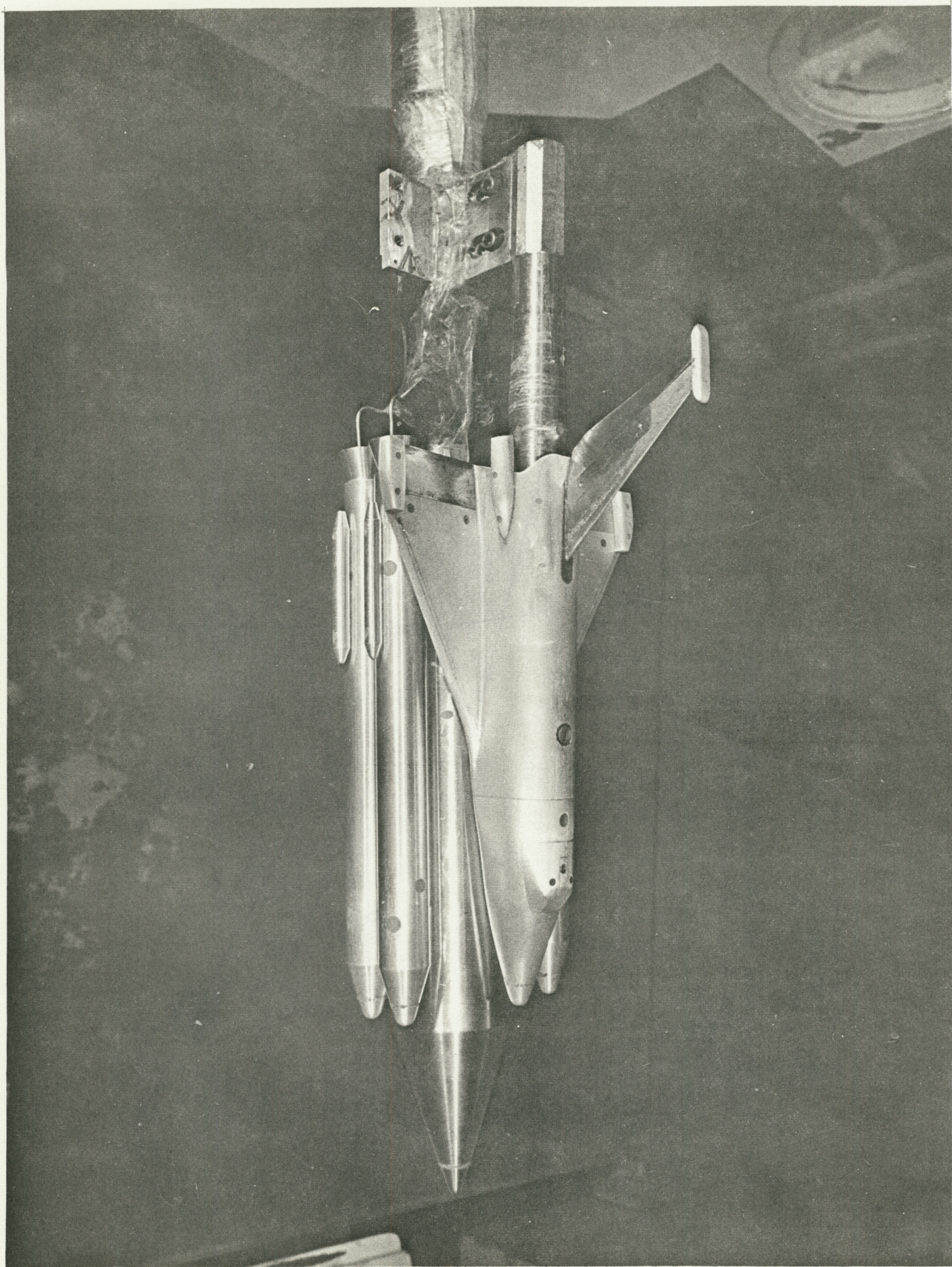
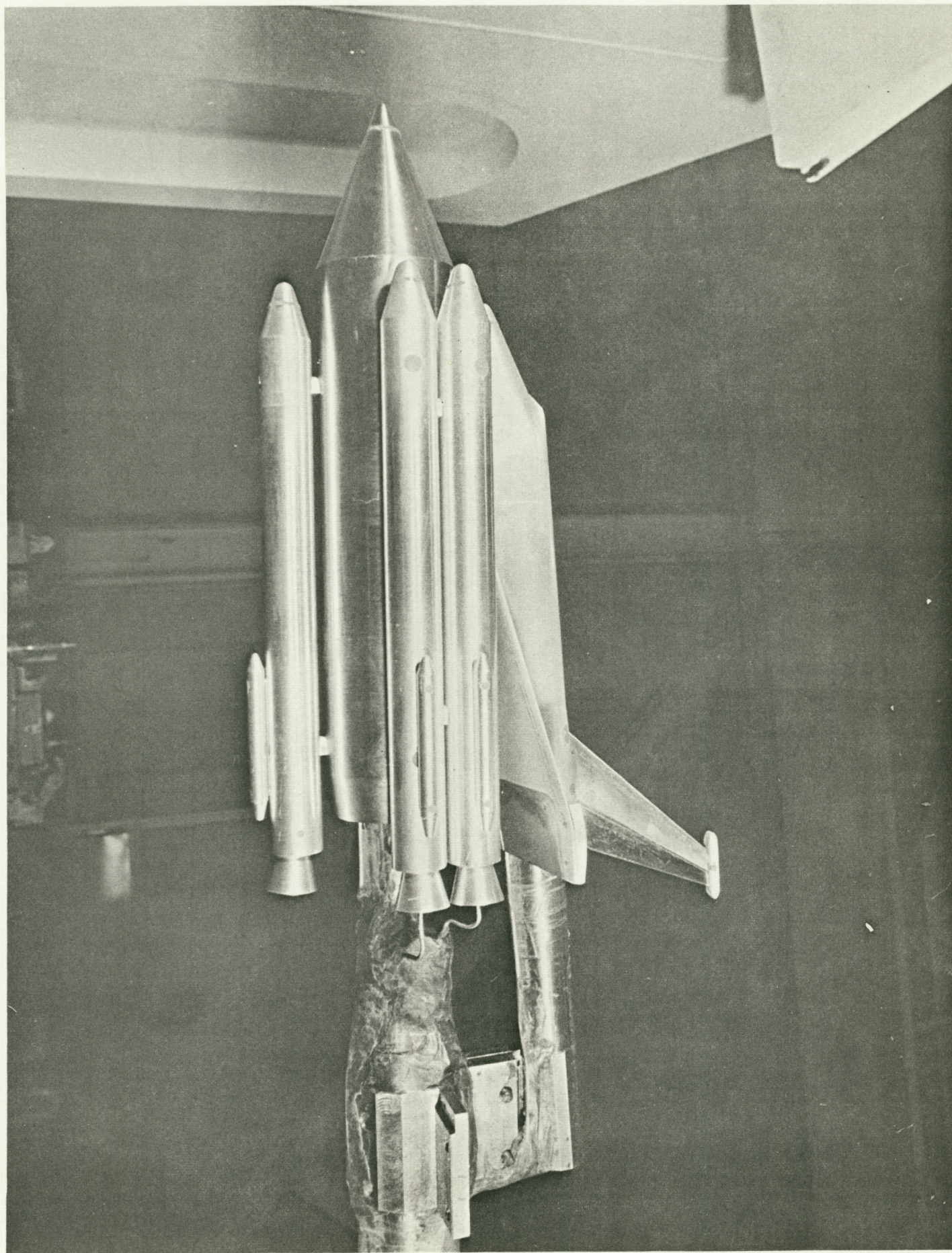
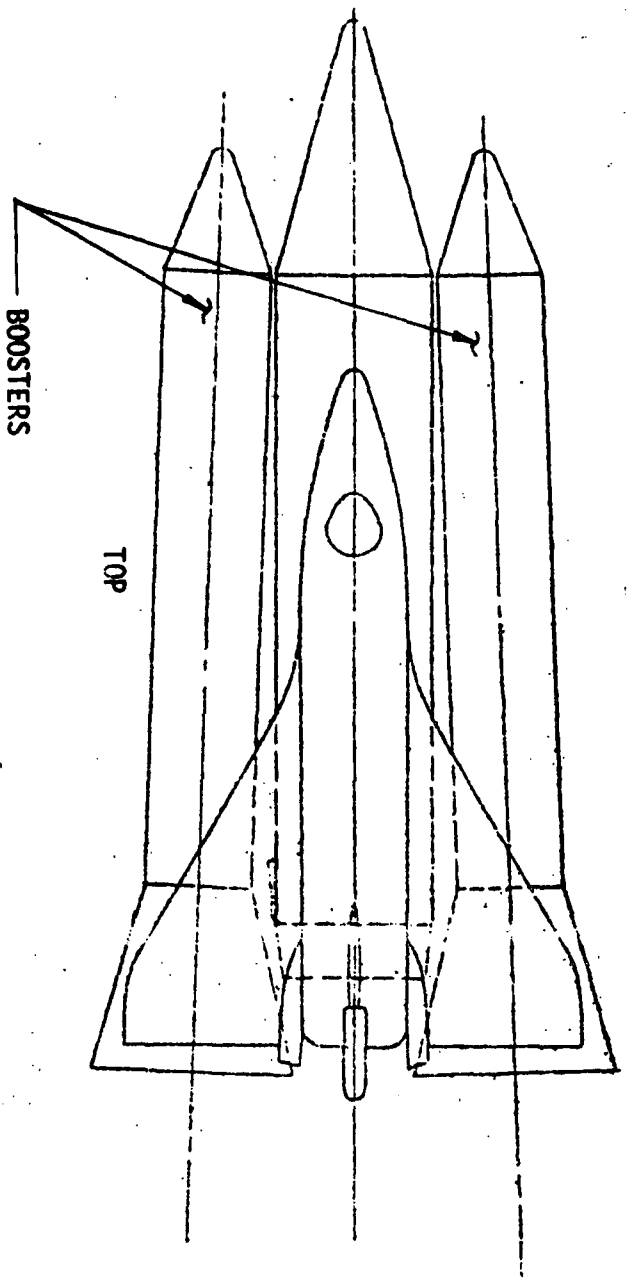


Figure 3. Photograph of Configuration (01) T⁴B7A1-5





ASCENT CONFIGURATION
GENERAL ARRANGEMENT
(B_1, T_1, O_1)

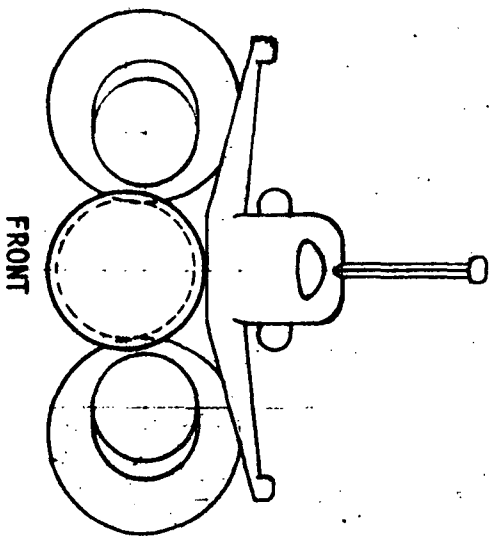
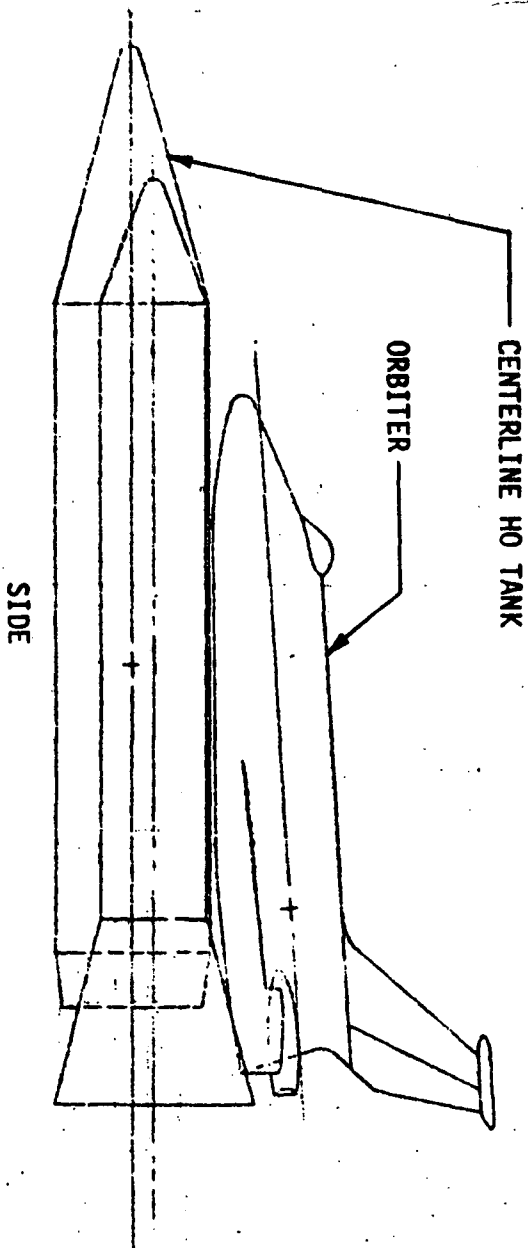
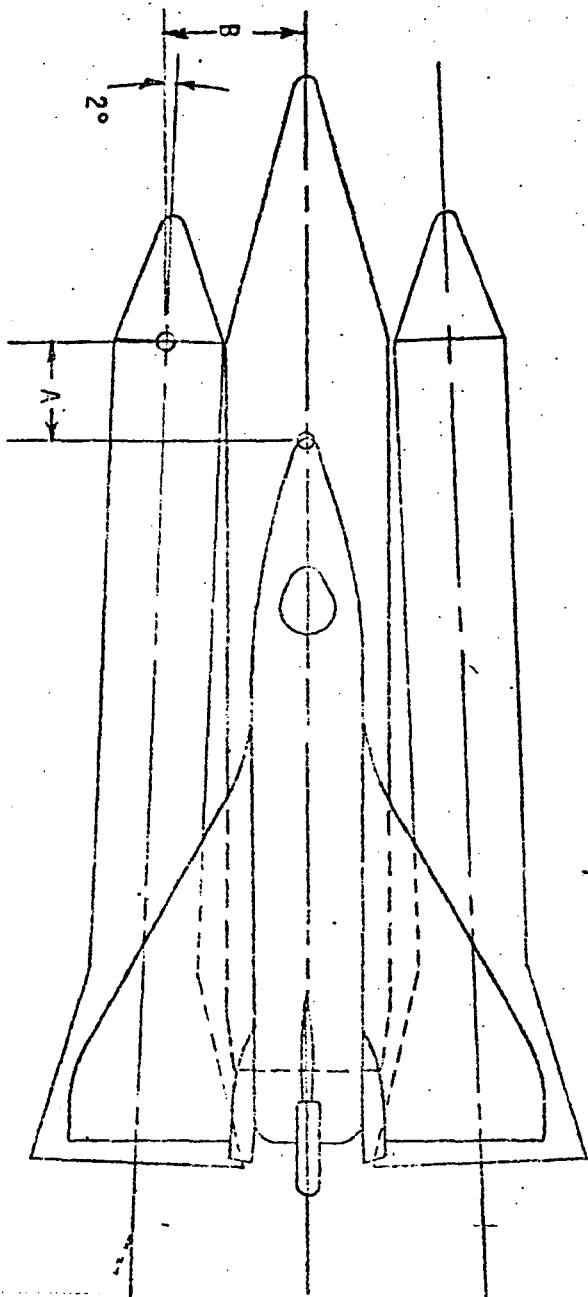


Figure 4. General Arrangement-Ascent Configuration $O_1 T_1 B_1$

B_1 OR B_5 BOOSTER LOCATION



| DIMENSION | TANK | |
|-----------|---------|-------|
| | T1 & T2 | T3 |
| A | 1.080 | 1.360 |
| B | 1.560 | 1.628 |
| C | 1.282 | 1.340 |

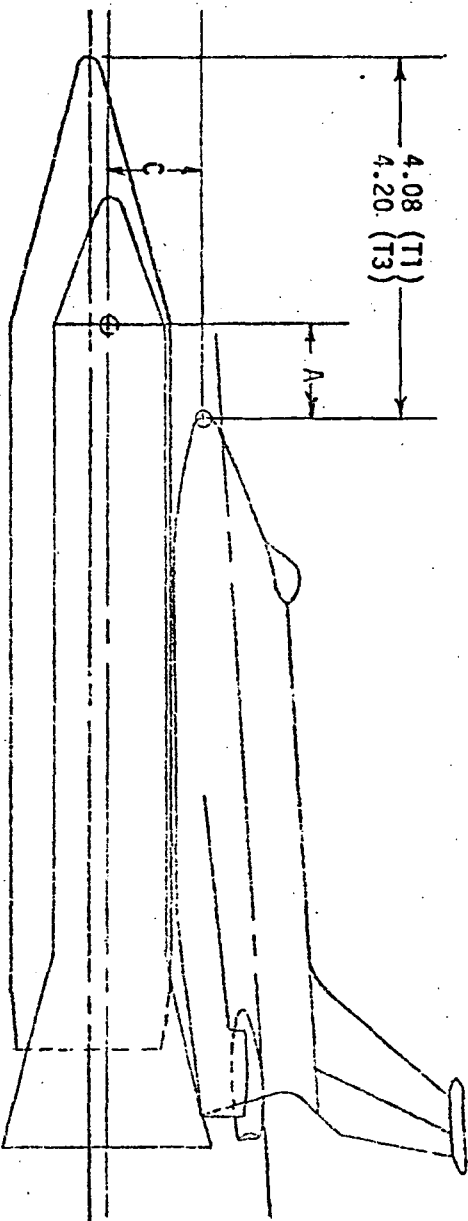
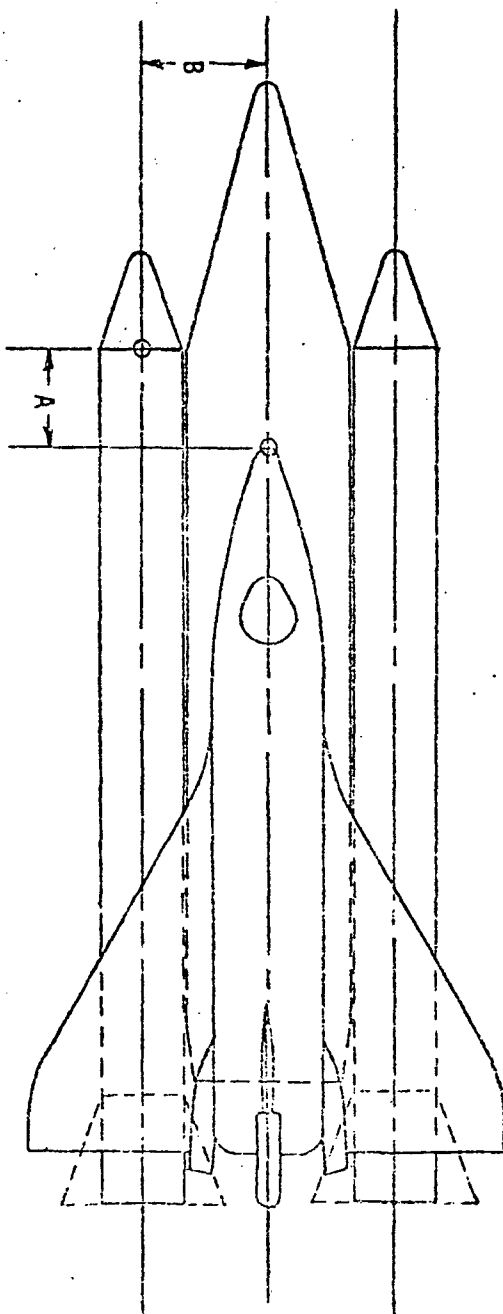


Figure 5. General Arrangement-Ascent Configuration
With Booster B_1 or B_5

B_2 AND B_2S BOOSTERS LOCATION



| DIMENSION | TANK | |
|-----------|---------|--------|
| | T1 & T2 | T3 |
| A | 1.080 | -1.522 |
| B | 1.420 | 1.488 |
| C | 1.072 | 1.080 |

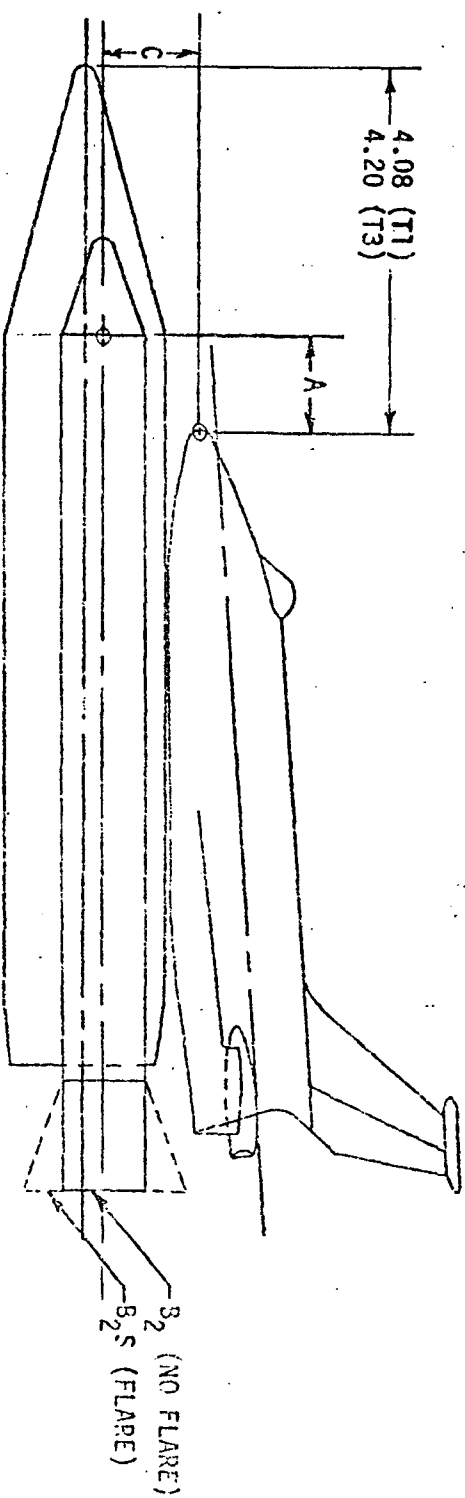
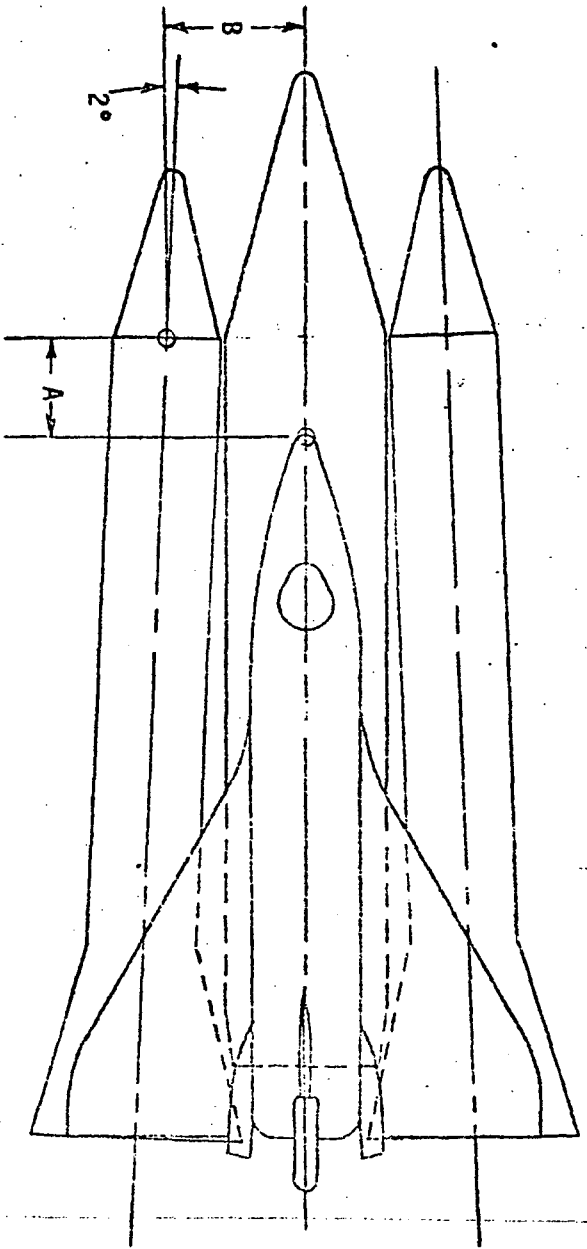


Figure 6. General Arrangement-Ascent Configuration with Booster B_2 or B_2S

B₃ BOOSTER LOCATION



| DIMENSION | TANK | |
|-----------|---------|-------|
| | T1 & T2 | T3 |
| A | 0.682 | 0.962 |
| B | 1.560 | 1.628 |
| C | 1.282 | 1.340 |

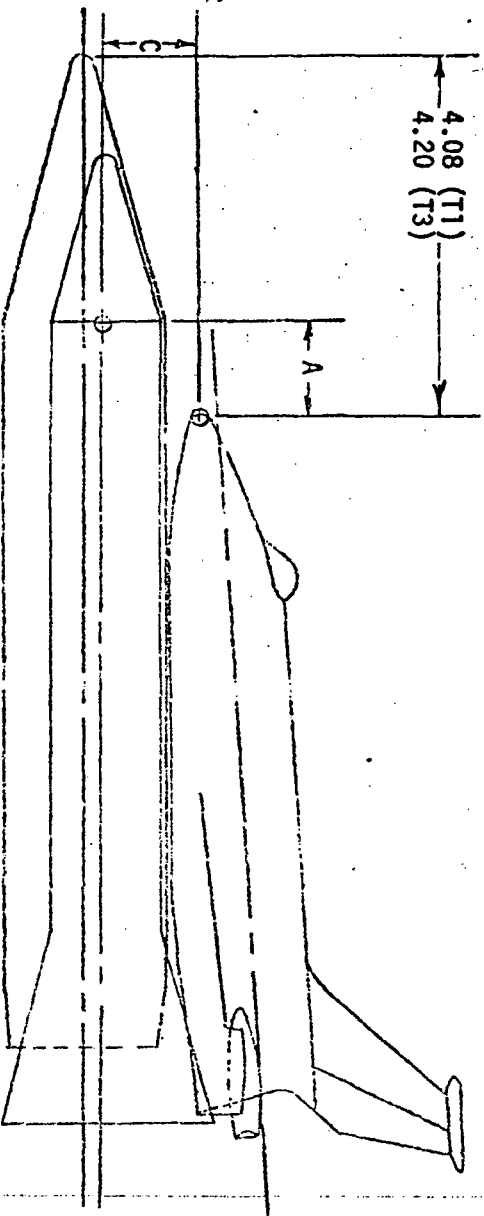
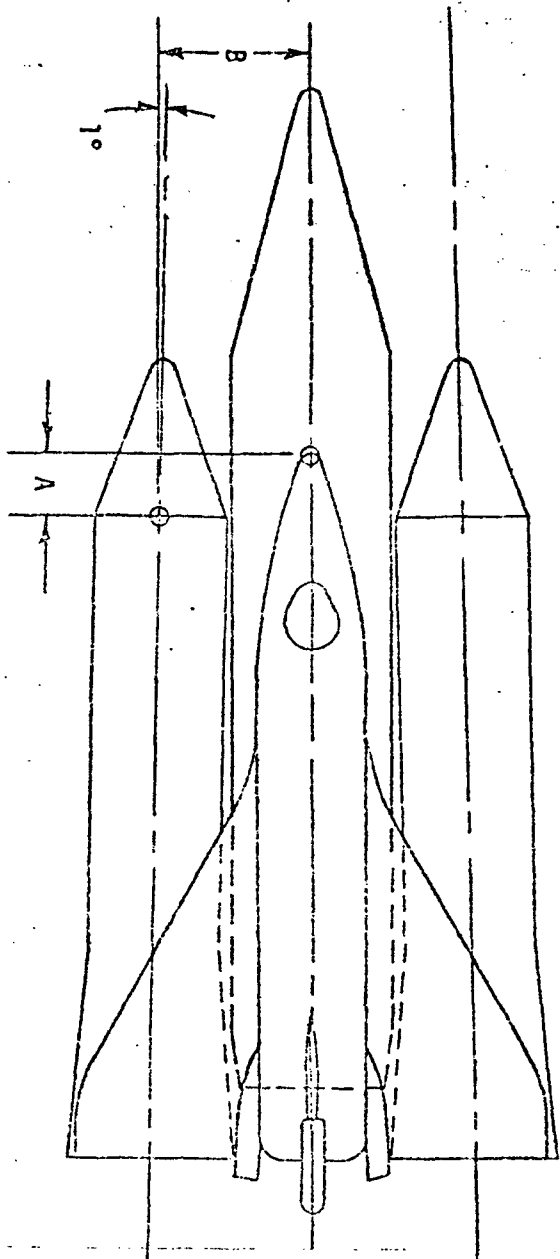


Figure 7. General Arrangement-Ascent Configuration with Booster B₃

B₄ BOOSTER LOCATION



| DIMENSION | TANK | |
|-----------|---------|-------|
| | T1 & T2 | T3 |
| A | 0.640 | 0.757 |
| B | 1.685 | 1.753 |
| C | 1.091 | 1.091 |

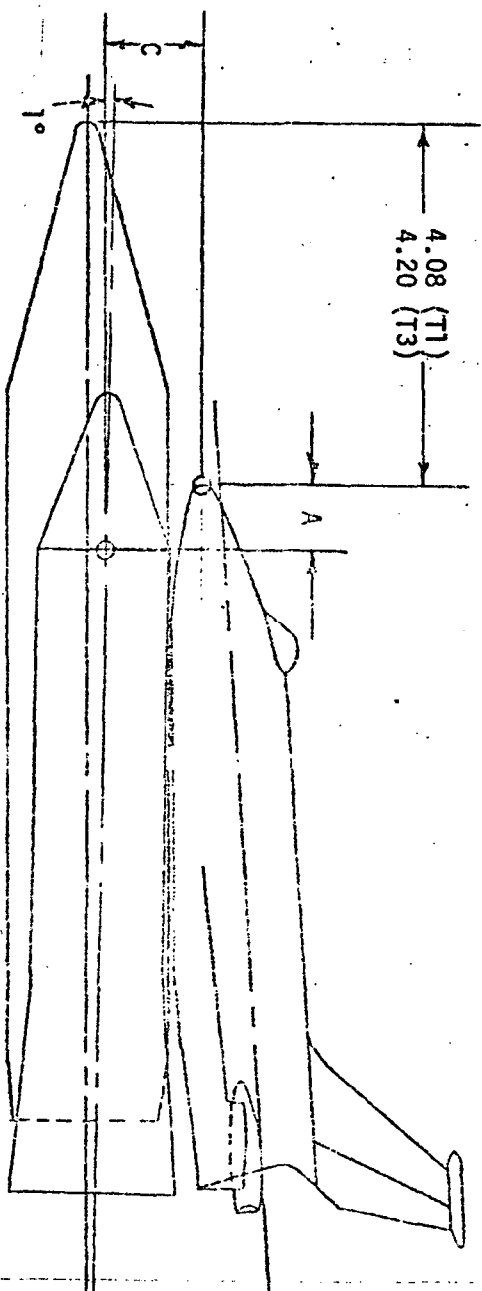


Figure 8. General Arrangement-Ascent Configuration with Booster B₄

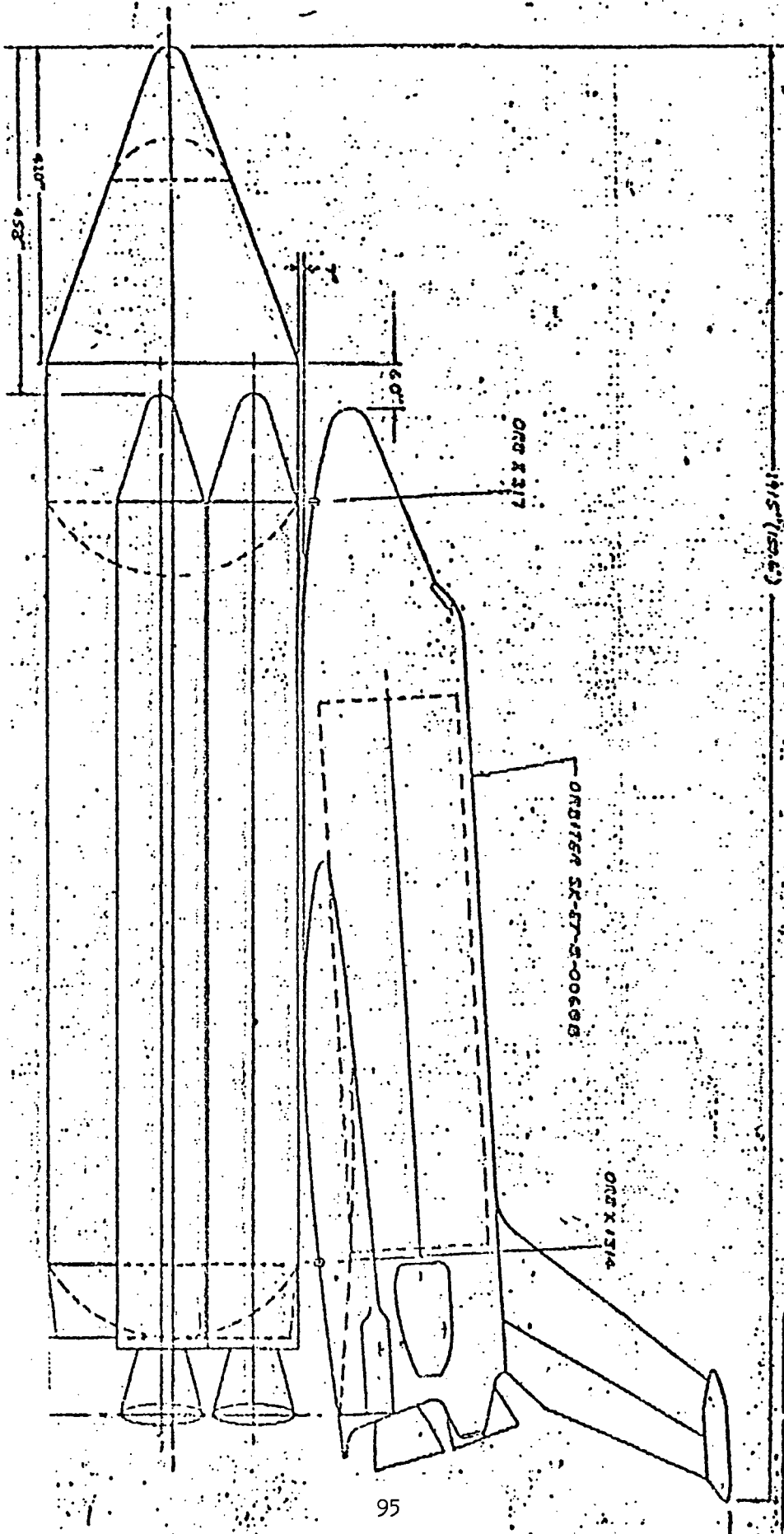


Figure 9. General Arrangement-Ascent Configuration
OLTMBT-4 (Side View)

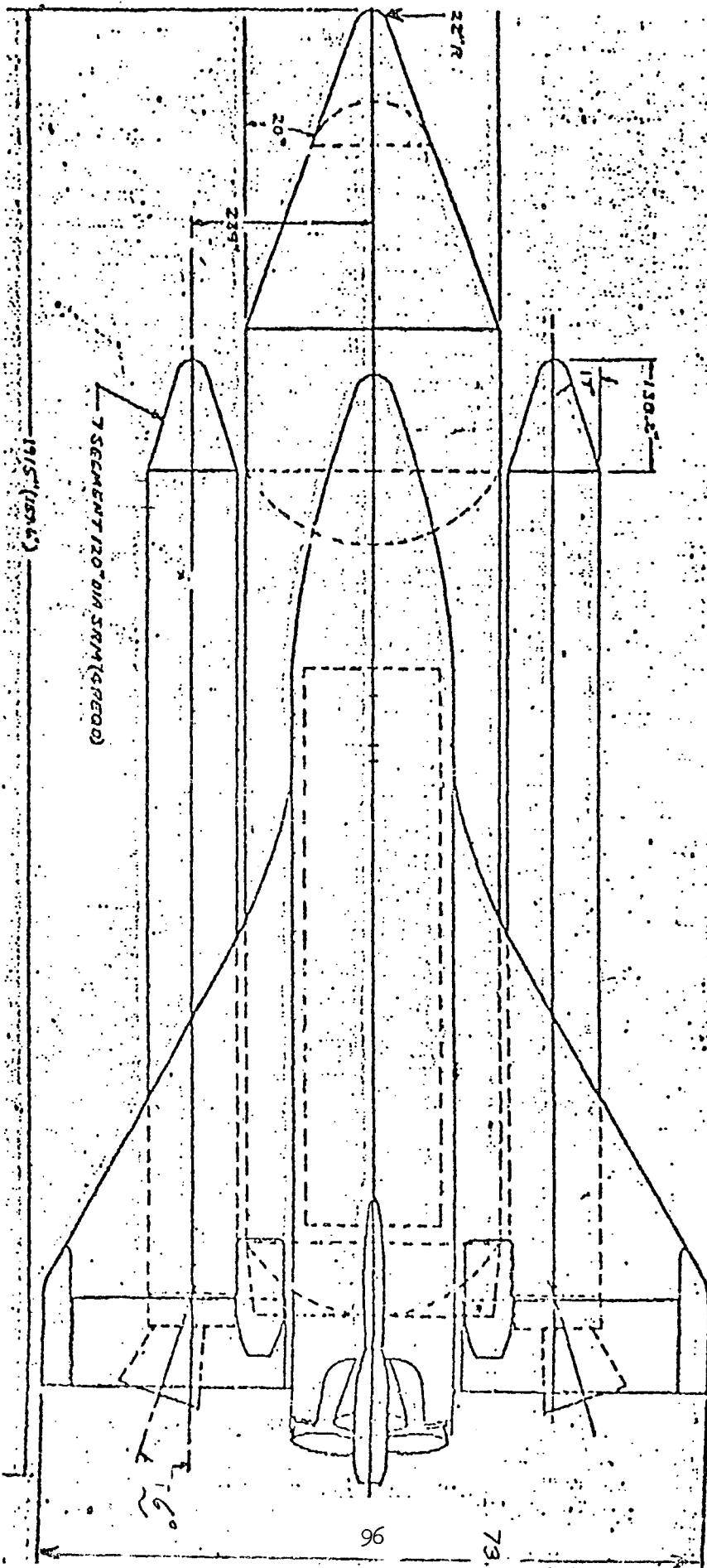
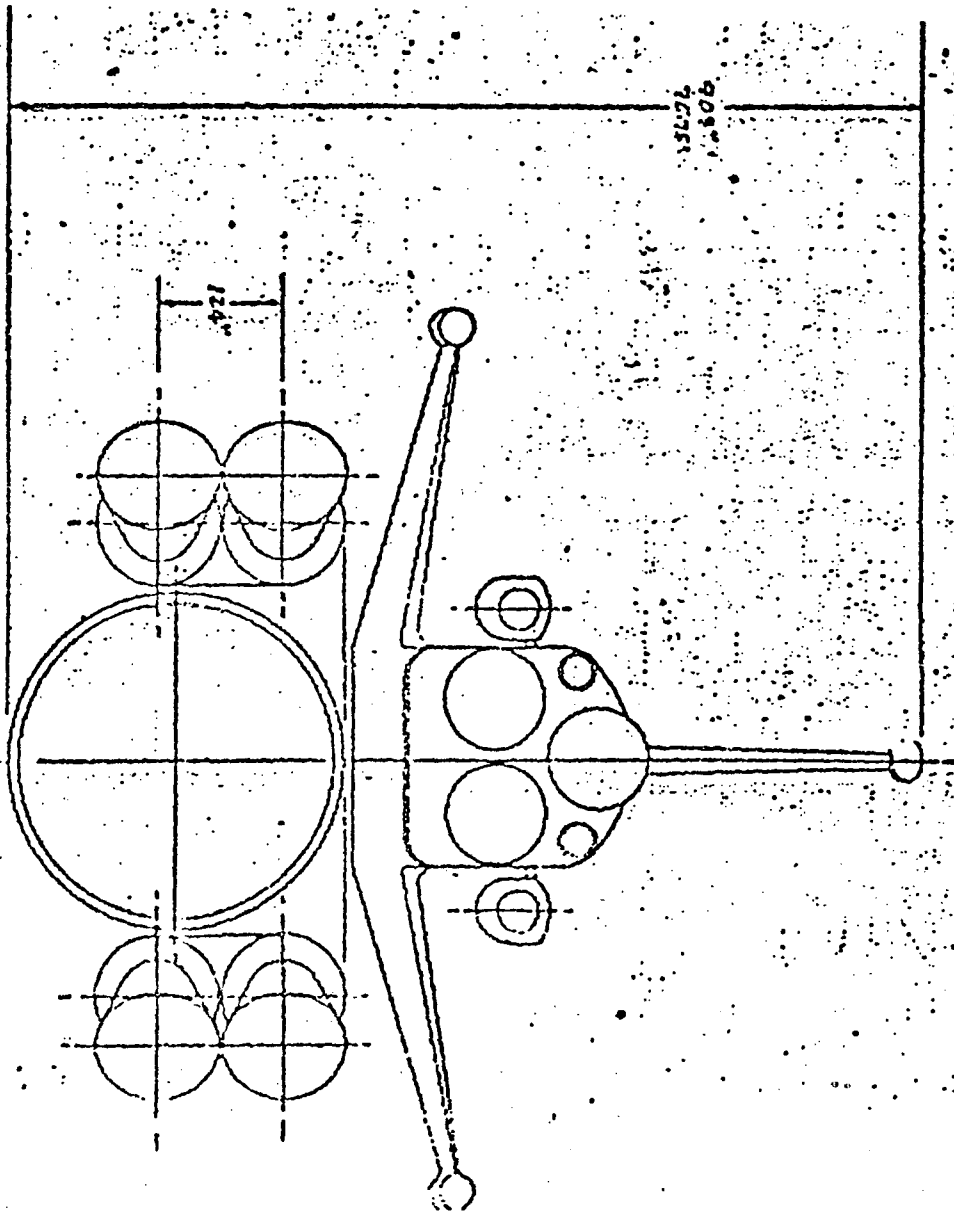


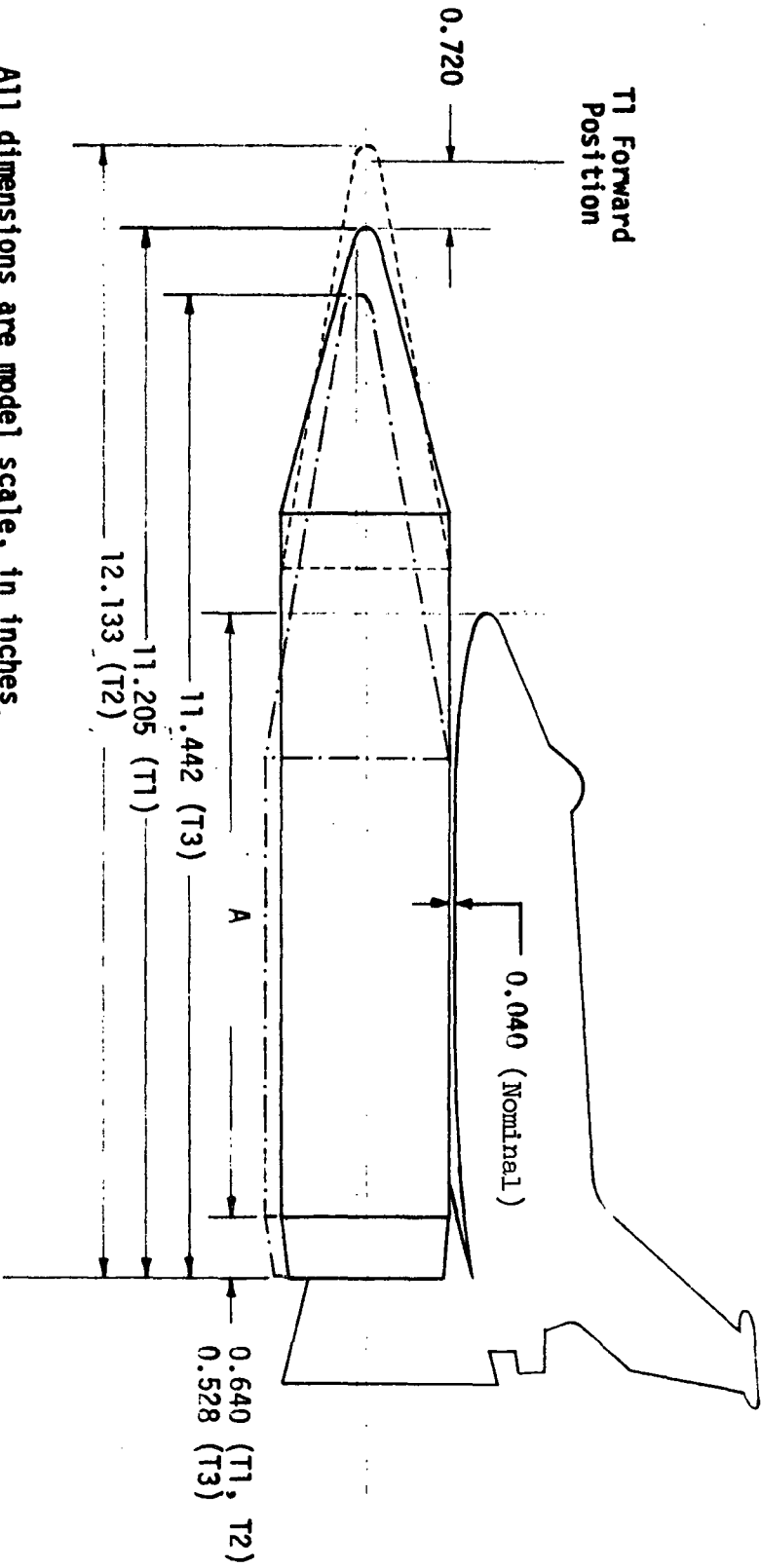
Figure 10. General Arrangement-Ascent Configuration
 OLT₄B7-4 (Top View)

Figure 11. General Arrangement-Ascent Configuration 0174B7-4
(Rear View)



CENTERLINE HO TANK LOCATIONS

Orbiter Nose
X (200)
1.200

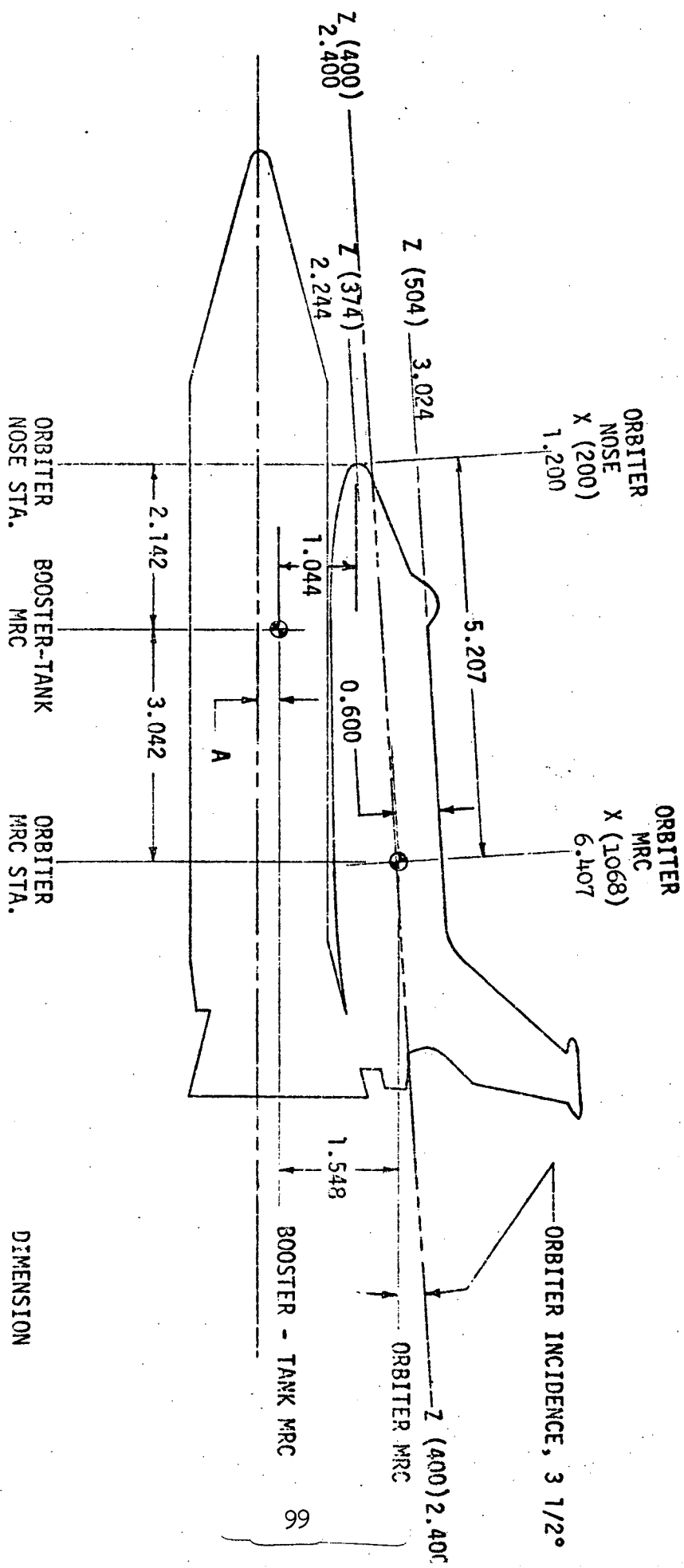


All dimensions are model scale, in inches.
Orbiter stations are given in both full
scale and model scale dimensions.

| TANK | A |
|------|-------|
| T1 | 6.485 |
| T2 | 6.485 |
| T3 | 6.714 |

Figure 12. Centerline HO Tank Locations

MOMENT TRANSFER DIAGRAM ASCENT CONFIGURATION



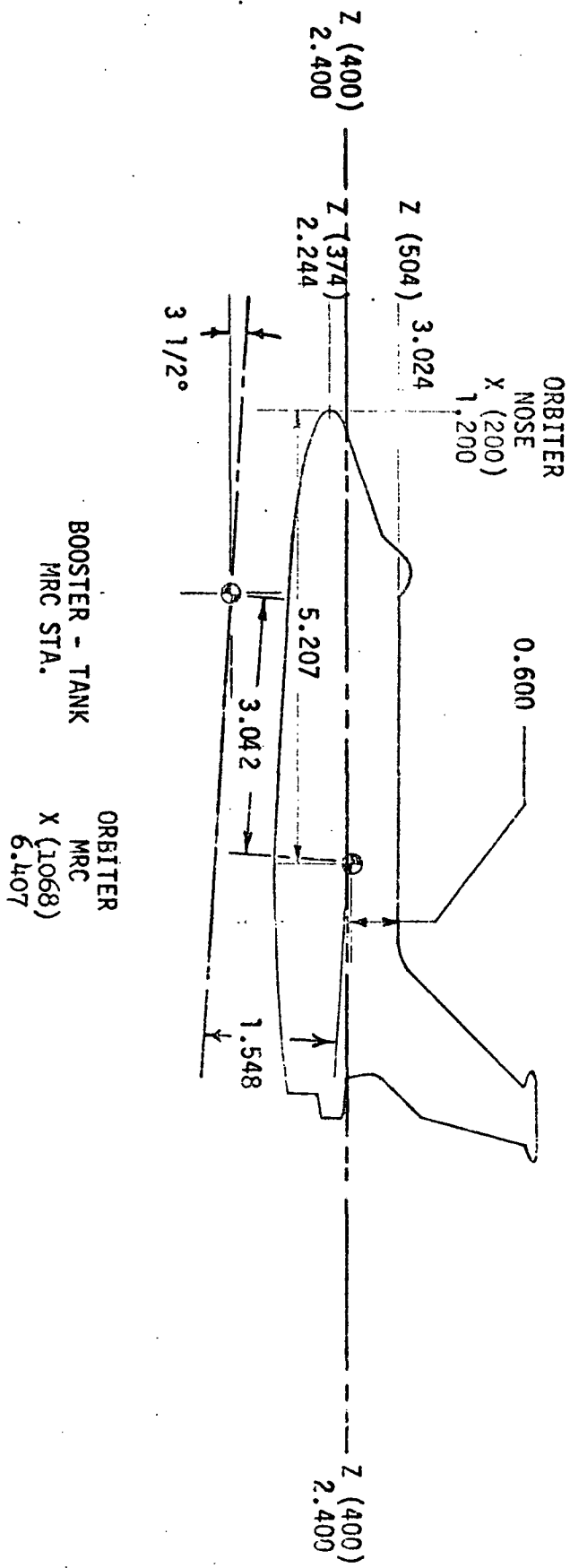
All dimensions are model scale, in inches
Orbiter stations are given in both full
scale and model scale dimensions.

| TANK | A |
|------|-------|
| T1 | 0.268 |
| T2 | 0.288 |
| T3 | 0.357 |

DIMENSION

Figure 13. Moment Transfer Diagram for Ascent Configuration

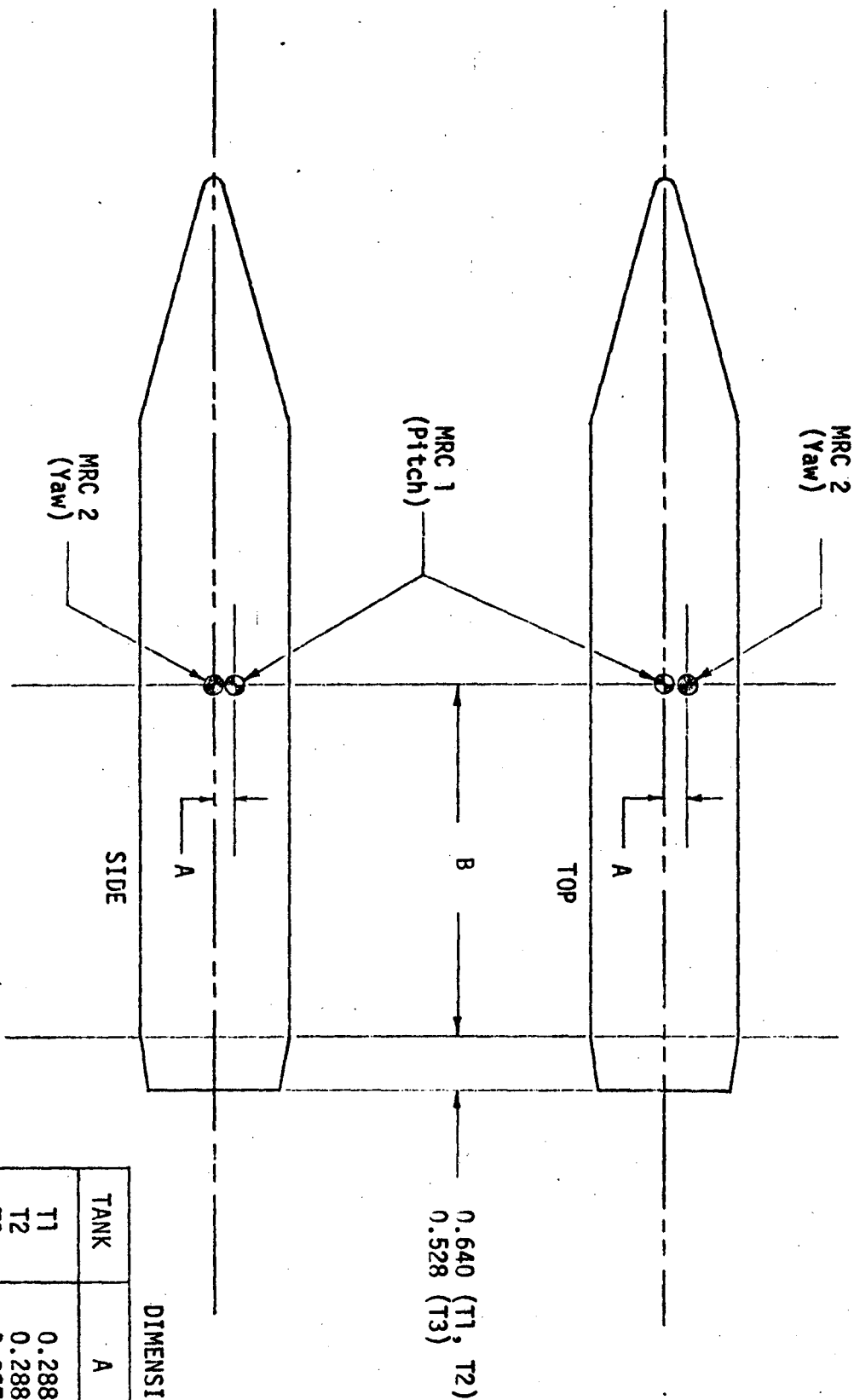
MOMENT TRANSFER DIAGRAM ORBITER ALONE



All dimensions are model scale, in inches
Orbiter stations are given in both full
scale and model scale dimensions.

Figure 14. Moment Transfer Diagram for Orbiter Alone

MOMENT TRANSFER DIAGRAM CENTERLINE TANK ALONE

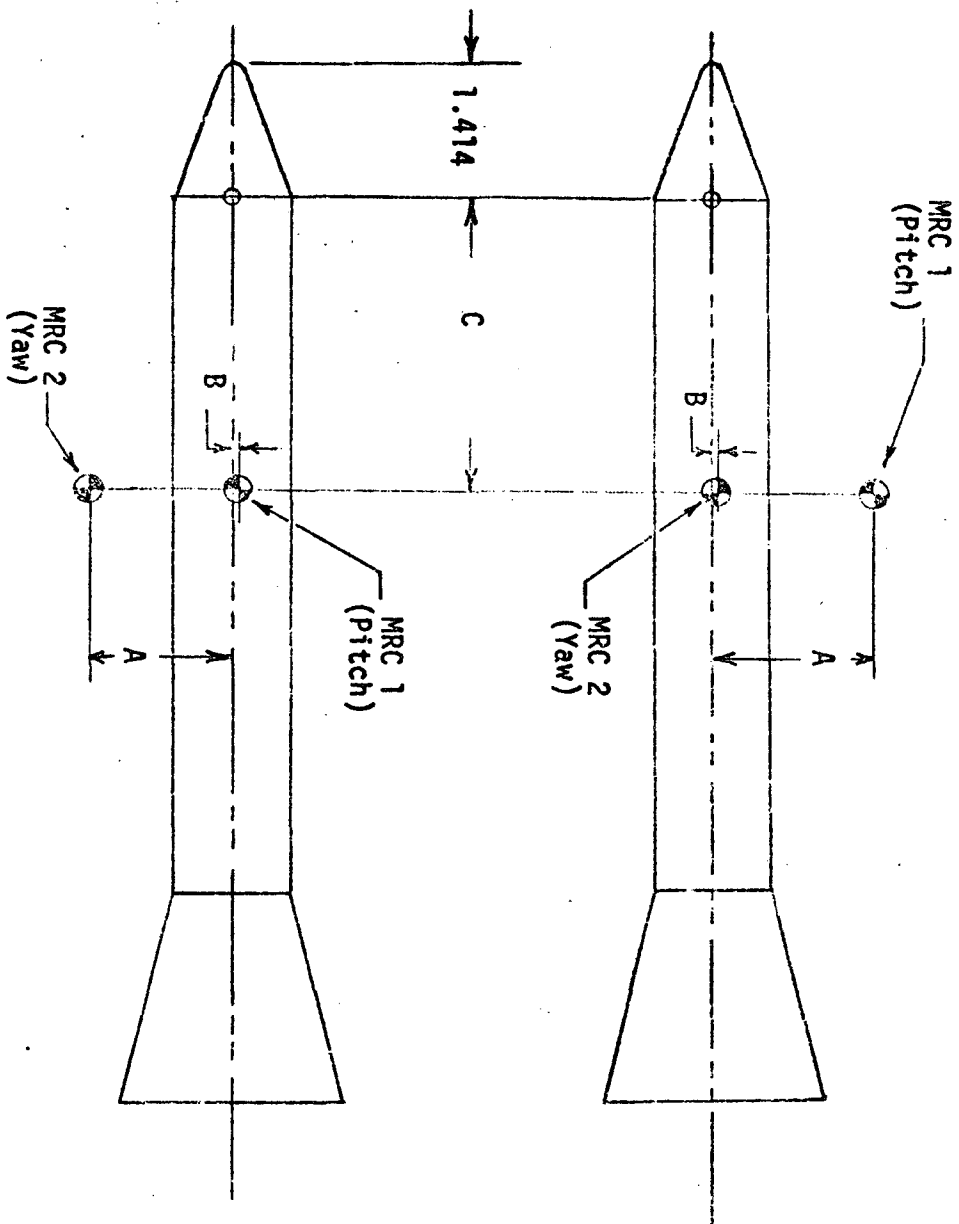


| TANK | A | B |
|------|-------|-------|
| T1 | 0.288 | 4.243 |
| T2 | 0.288 | 4.243 |
| T3 | 0.357 | 4.572 |

All dimensions are model scale, in inches

Figure 15. Moment Transfer Diagram for Centerline Tank Alone

MOMENT TRANSFER DIAGRAM B₁ Booster Alone

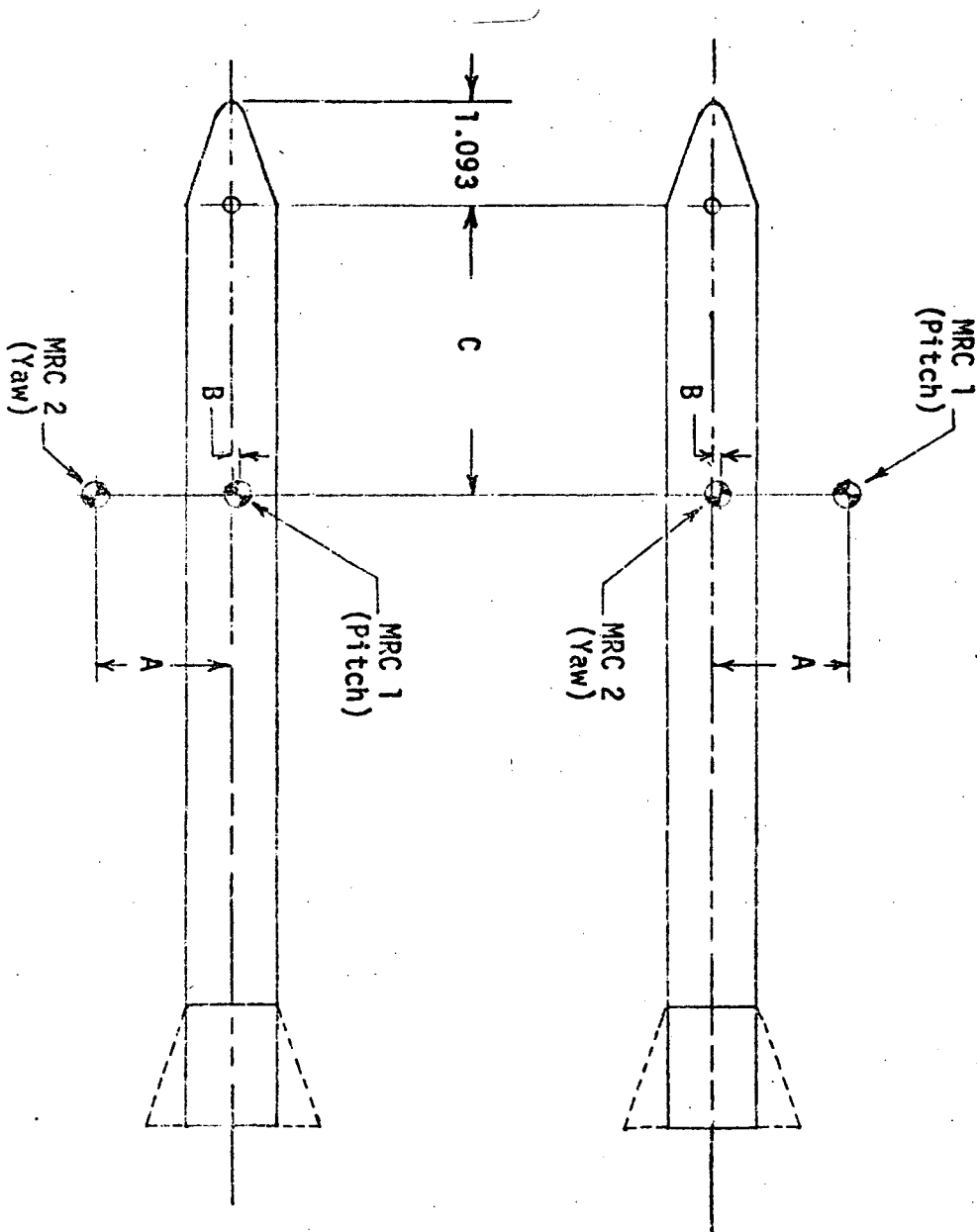


| Dimension | | | |
|----------------|-------|-------|-------|
| TANK | A | B | C |
| T ₁ | 1.664 | 0.238 | 3.222 |
| T ₂ | 1.664 | 0.238 | 3.222 |
| T ₃ | 1.732 | 0.297 | 3.502 |

Booster Alone
X = 4.386" From nose
Y = 0
Z = 0

Figure 16. Moment Transfer Diagram for B1 Booster Alone

MOMENT TRANSFER DIAGRAM B₂ and B₂S Boosters Alone



| | DIMENSION | | |
|----------------|-----------|-------|-------|
| TANK | A | B | C |
| T ₁ | 1.420 | 0.058 | 3.222 |
| T ₂ | 1.420 | 0.058 | 3.222 |
| T ₃ | 1.483 | 0.037 | 3.664 |

Booster Alone

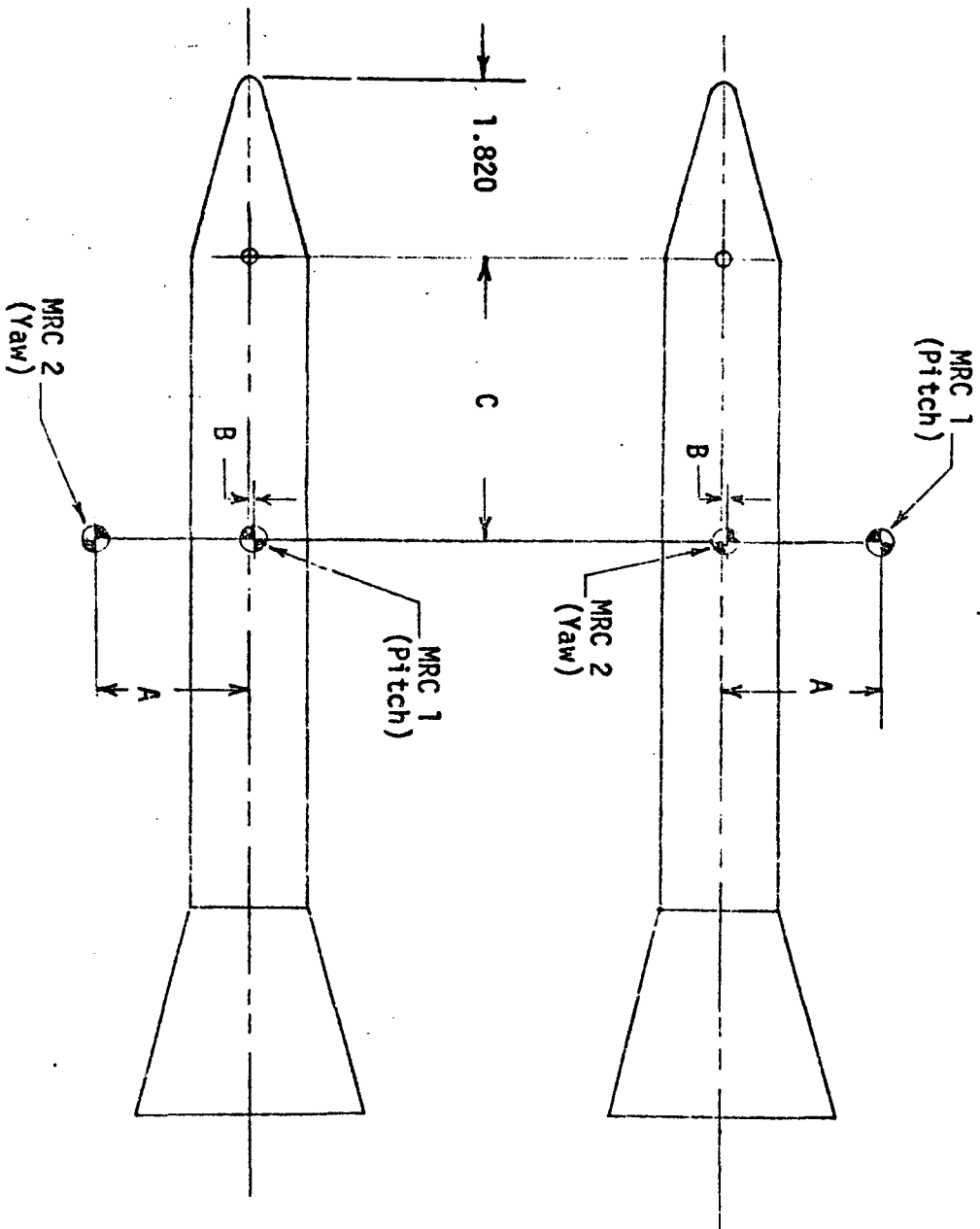
X = 4.091" From nose

Y = 0

Z = 0

Figure 17. Moment Transfer Diagram for B₂ & B₂S Boosters Alone

MOMENT TRANSFER DIAGRAM B₃ Booster Alone



| TANK | DIMENSION | | |
|----------------|-----------|-------|-------|
| | A | B | C |
| T ₁ | 1.664 | 0.238 | 2.824 |
| T ₂ | 1.664 | 0.238 | 2.824 |
| T ₃ | 1.732 | 0.297 | 3.104 |

Booster Alone

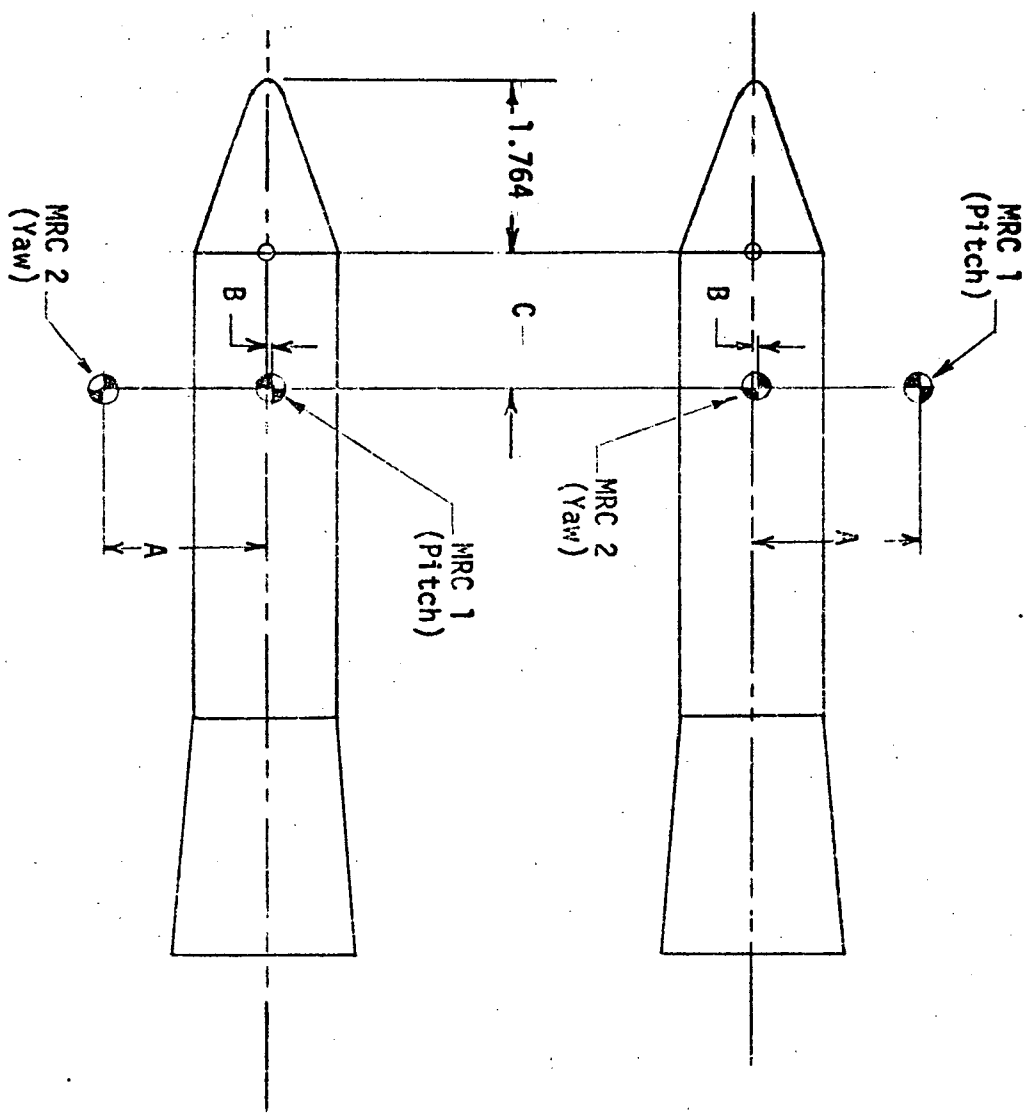
X = 4.386" From nose

Y = 0

Z = 0

Figure 18. Moment Transfer Diagram for B₃ Booster Alone

MOMENT TRANSFER DIAGRAM B₄ Booster Alone



| TANK | DIMENSION | | |
|----------------|-----------|-------|-------|
| | A | B | C |
| T ₁ | 1.709 | 0.047 | 1.502 |
| T ₂ | 1.709 | 0.047 | 1.502 |
| T ₃ | 1.774 | 0.047 | 1.385 |

Booster Alone

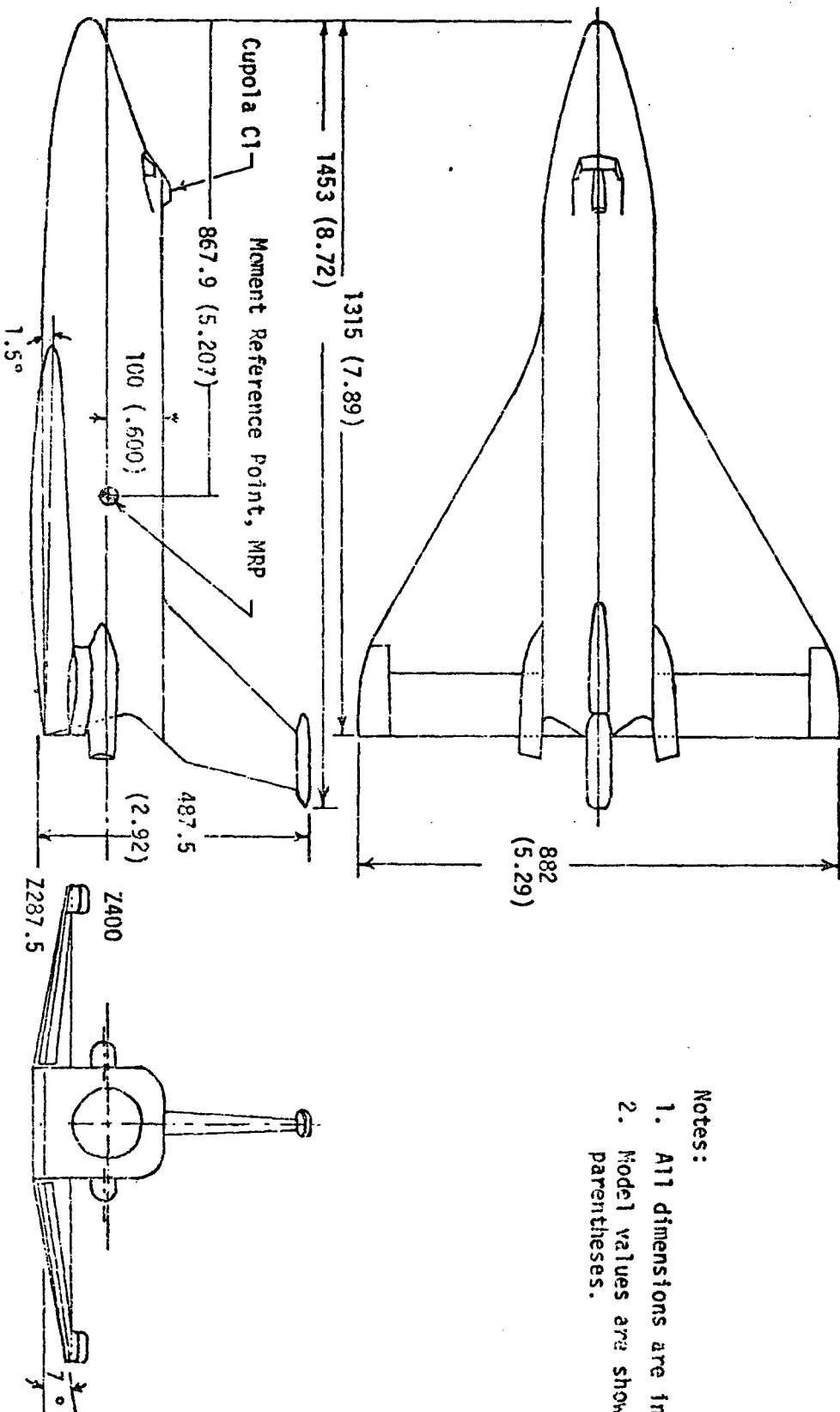
X = 3.152" From nose

Y = 0

Z = 0

Figure 19. Moment Transfer Diagram for B₄ Booster Alone

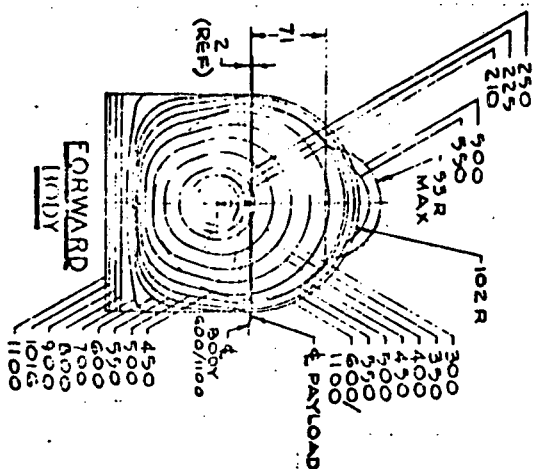
GENERAL ARRANGEMENT O40A ORBITER



- Notes:
1. All dimensions are in inches
 2. Model values are shown in parentheses.

Figure 20. General Arrangement O40A Orbiter

ORBITER BODY ~ B1



NOTES:
1. ALL DIMENSIONS ARE IN INCHES.
2. MODEL VALUES ARE SHOWN IN PARENTHESES.

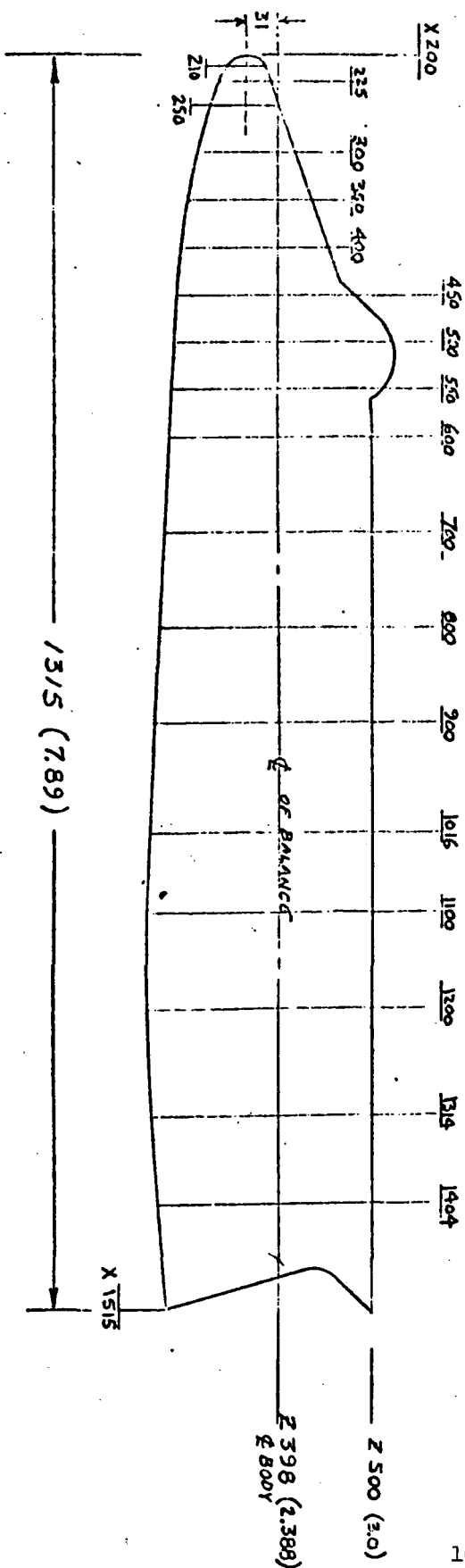
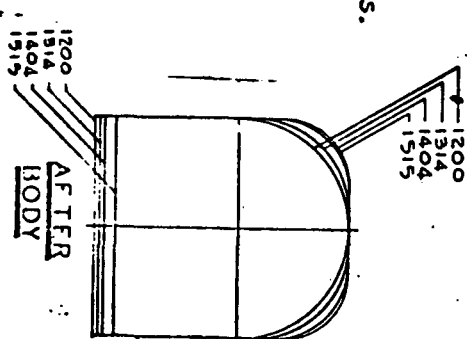
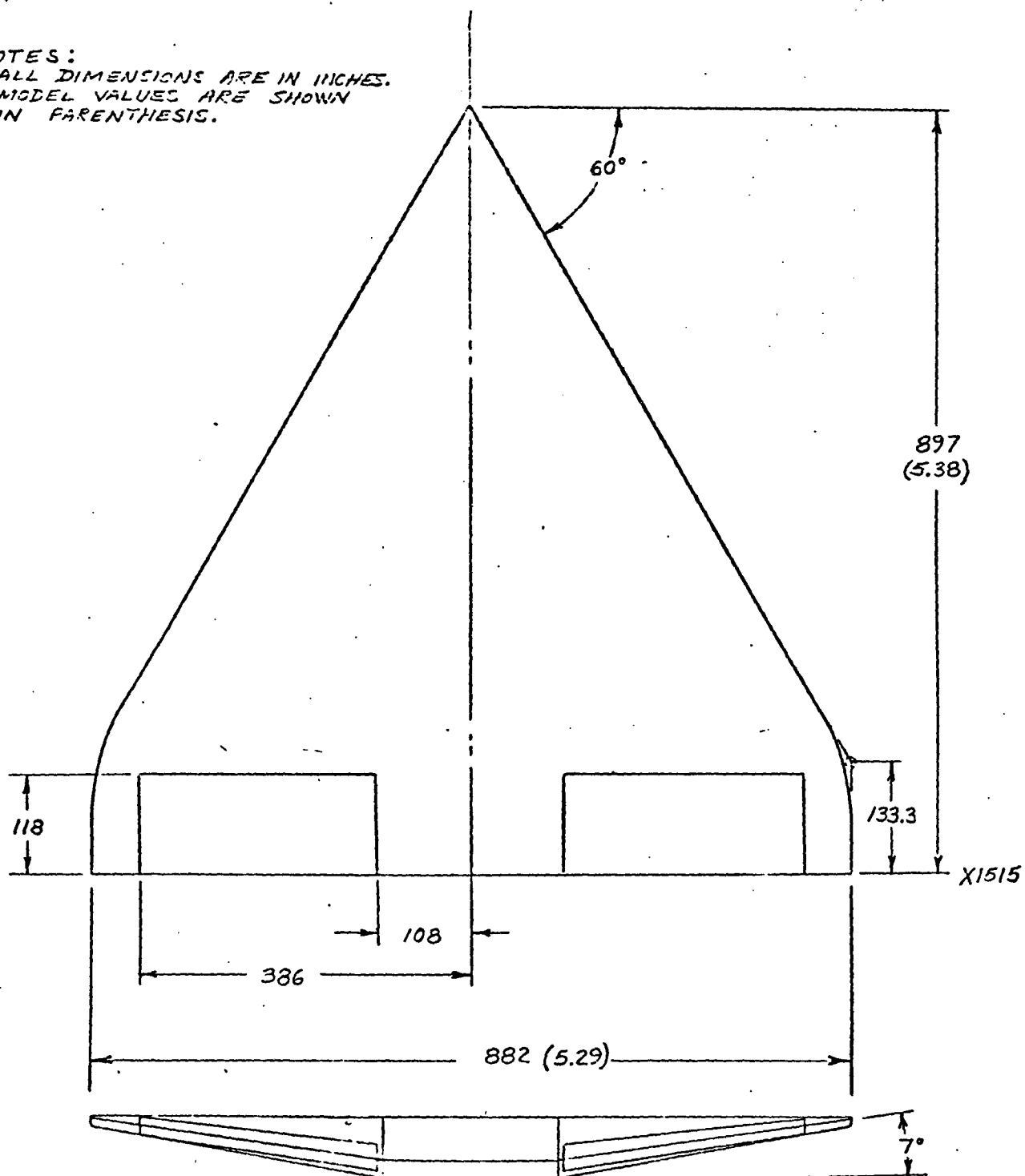


Figure 21. Orbiter Body, B₁

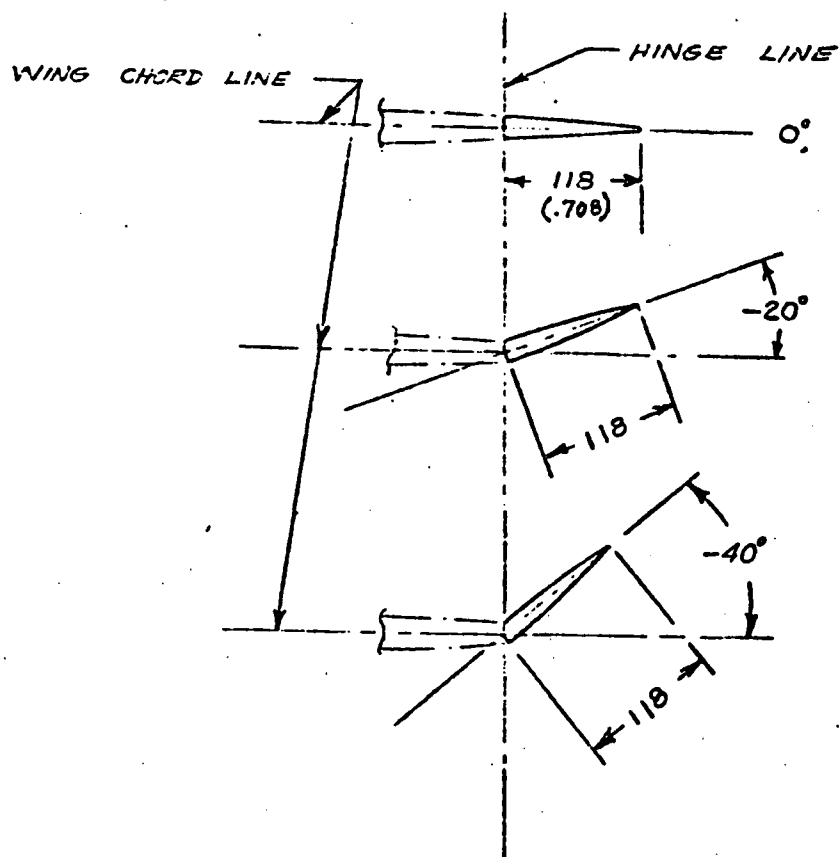
WING AND ELEVON ~ W1

NOTES:
 1. ALL DIMENSIONS ARE IN INCHES.
 2. MODEL VALUES ARE SHOWN
 IN PARENTHESIS.



.. Figure 22. Wing and Elevon, W₁

ELEVON DEFLECTIONS



RUDDER FLARE AT A TYPICAL SECTION

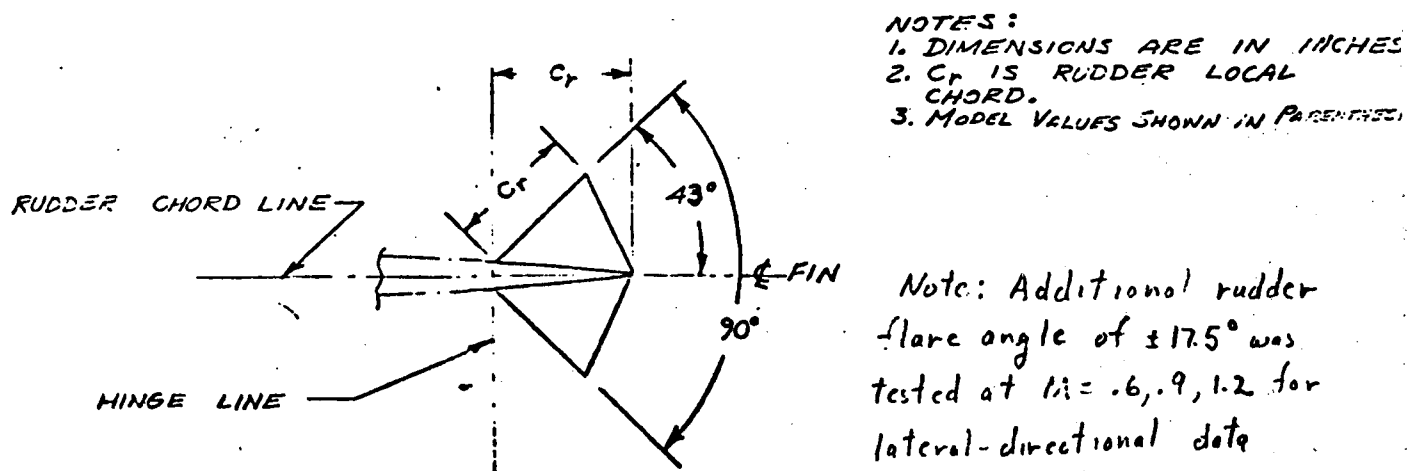


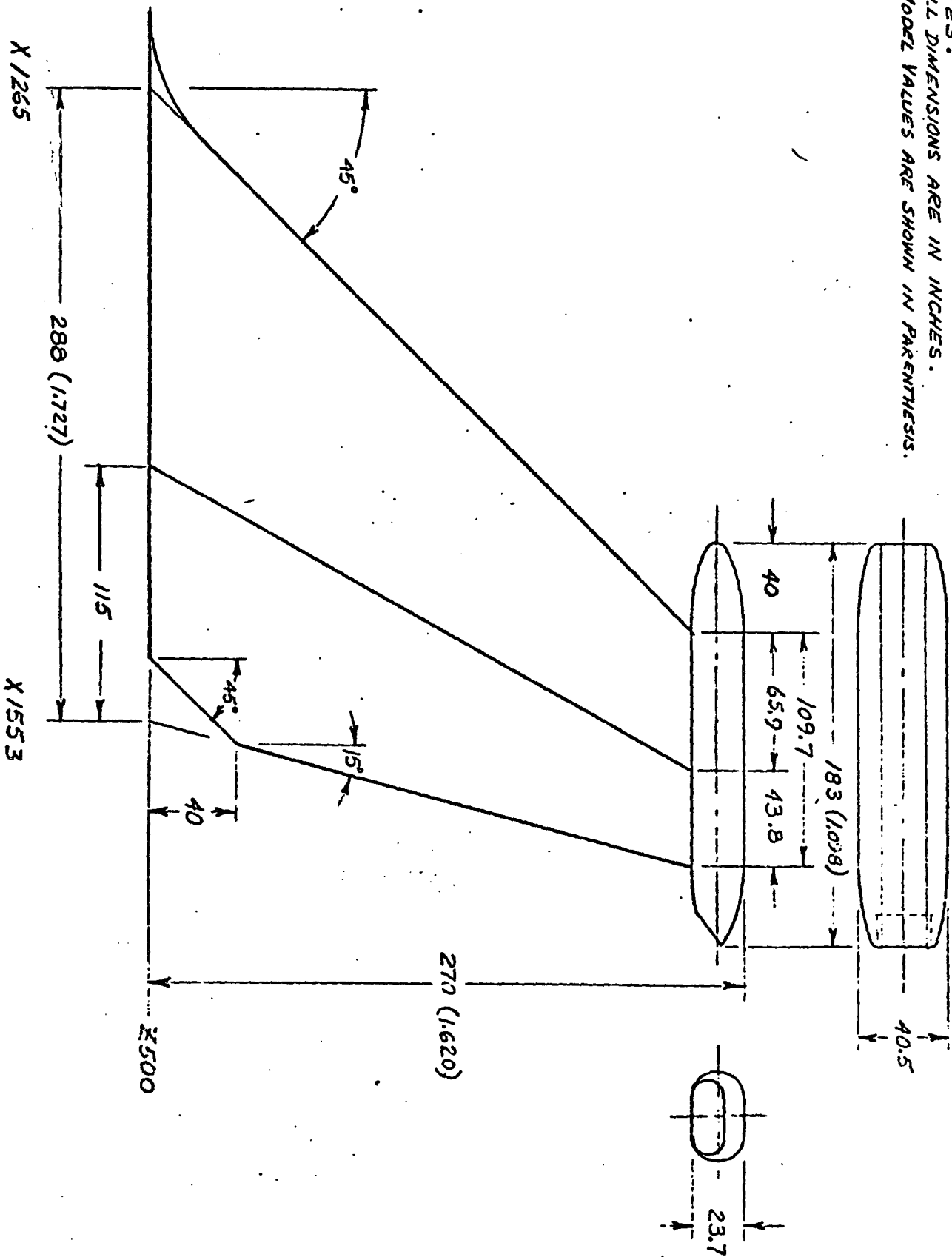
Figure 23. Elevon Deflections and Rudder Flare

Figure 24. Vertical Fin and Rudder, V1

NOTES:

1. ALL DIMENSIONS ARE IN INCHES.

2. MODEL VALUES ARE SHOWN IN PARENTHESIS.



V₂ - LARGER AREA CENTERLINE VERTICAL TAIL AND RUDDER

$$S_v = 2.514 \text{ in}^2$$

$$b = 2.215 \text{ in}$$

$$\bar{c} = 1.239 \text{ in}$$

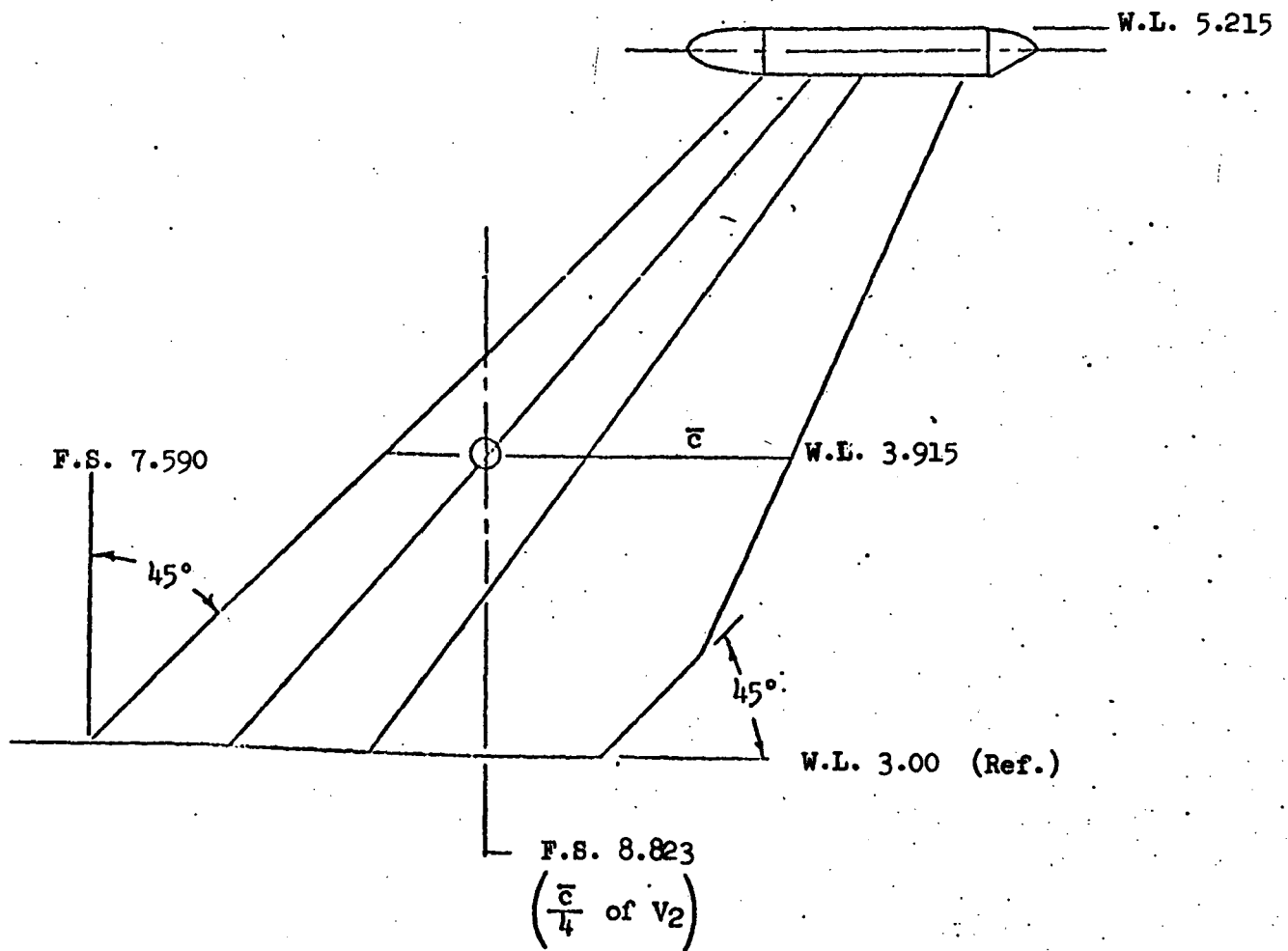
$$AR = 1.95$$

$$C_R = 1.728 \text{ in}$$

$$C_T = 0.542 \text{ in}$$

$$\lambda = 0.310$$

$$\Lambda_{LE} = 45^\circ$$

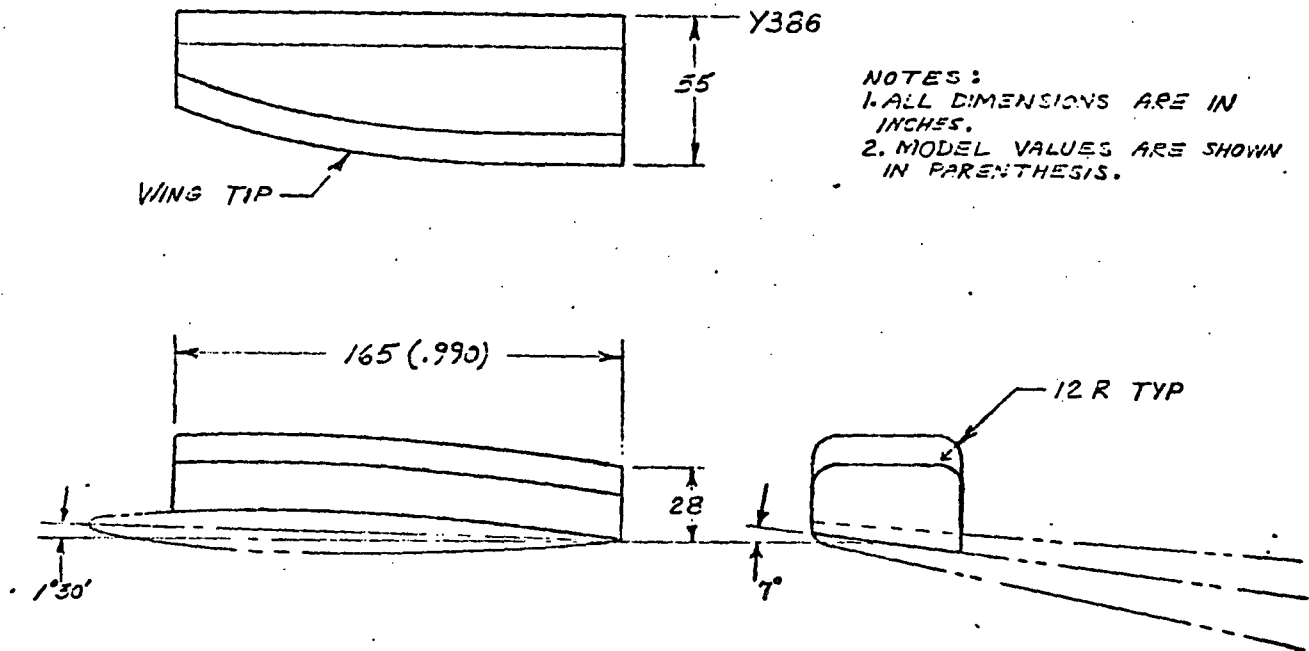


Note: All dimensions are model scale in inches.

Figure 25. Vertical Fin and Rudder, V₂

MCDONNELL DOUGLAS CORPORATION

ACPS ENGINE POD ~ P1



OMS ENGINE POD ~ M1

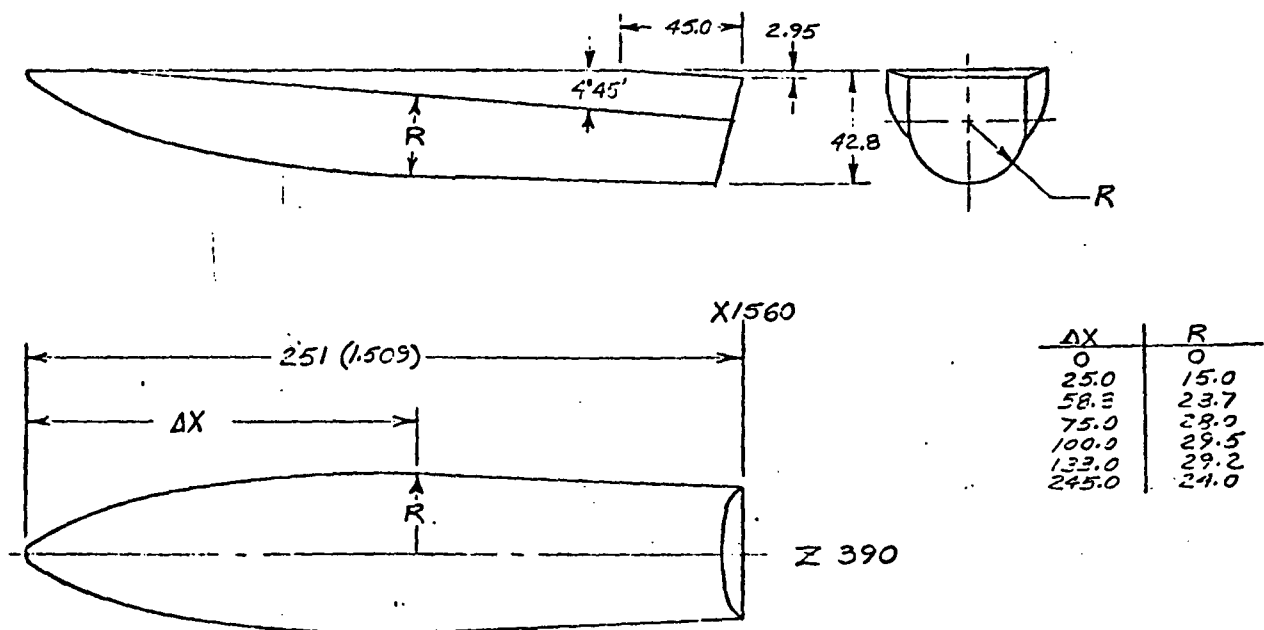
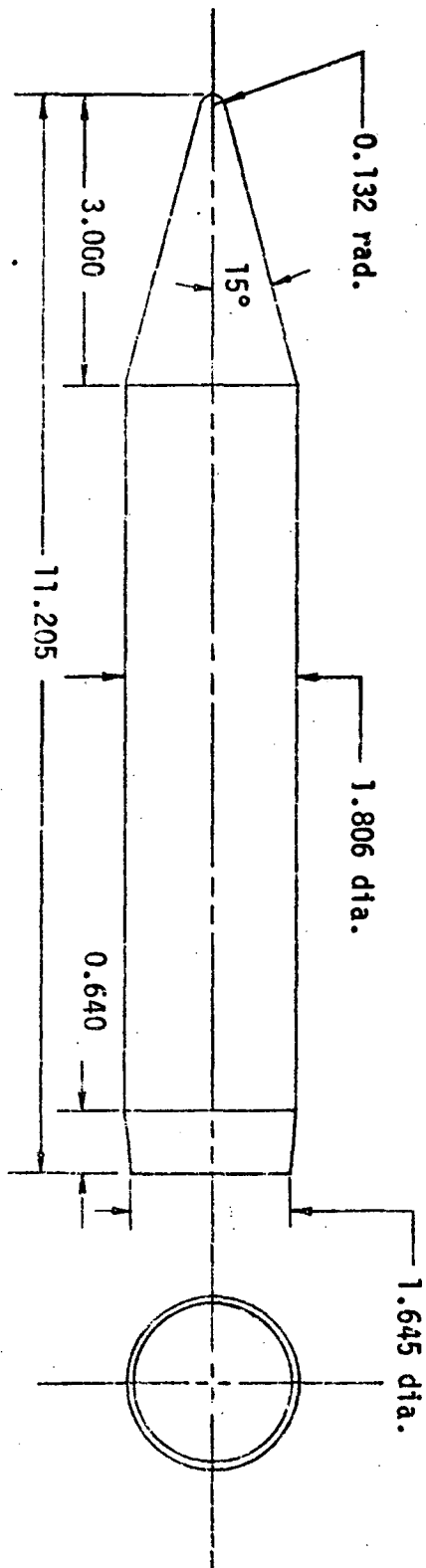


Figure 26. ACPS Engine Pod, P1 and OMS Engine Pod, M1

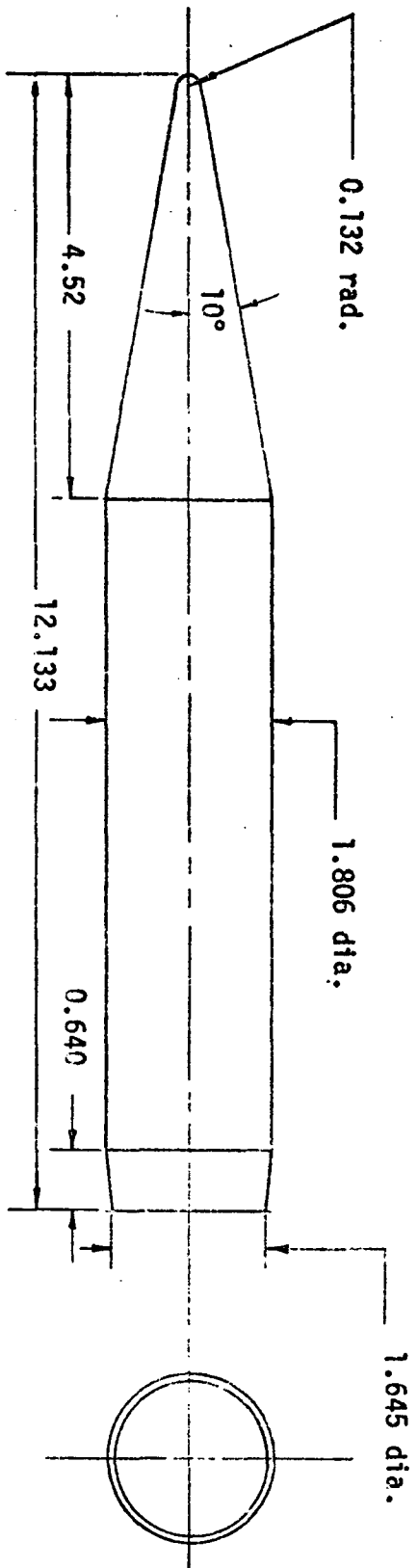
HO TANK, T₁



All dimensions are model scale, in inches.

Figure 27. Centerline HO Tank, T₁

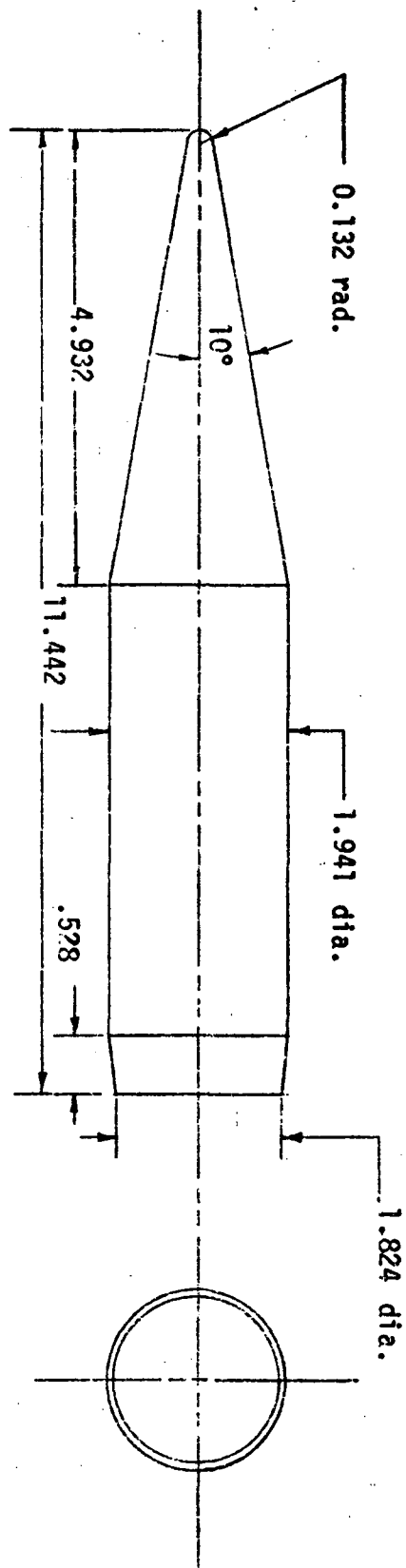
HO TANK, T₂



All dimensions are model scale, in inches.

Figure 28. Centerline HO Tank, T₂

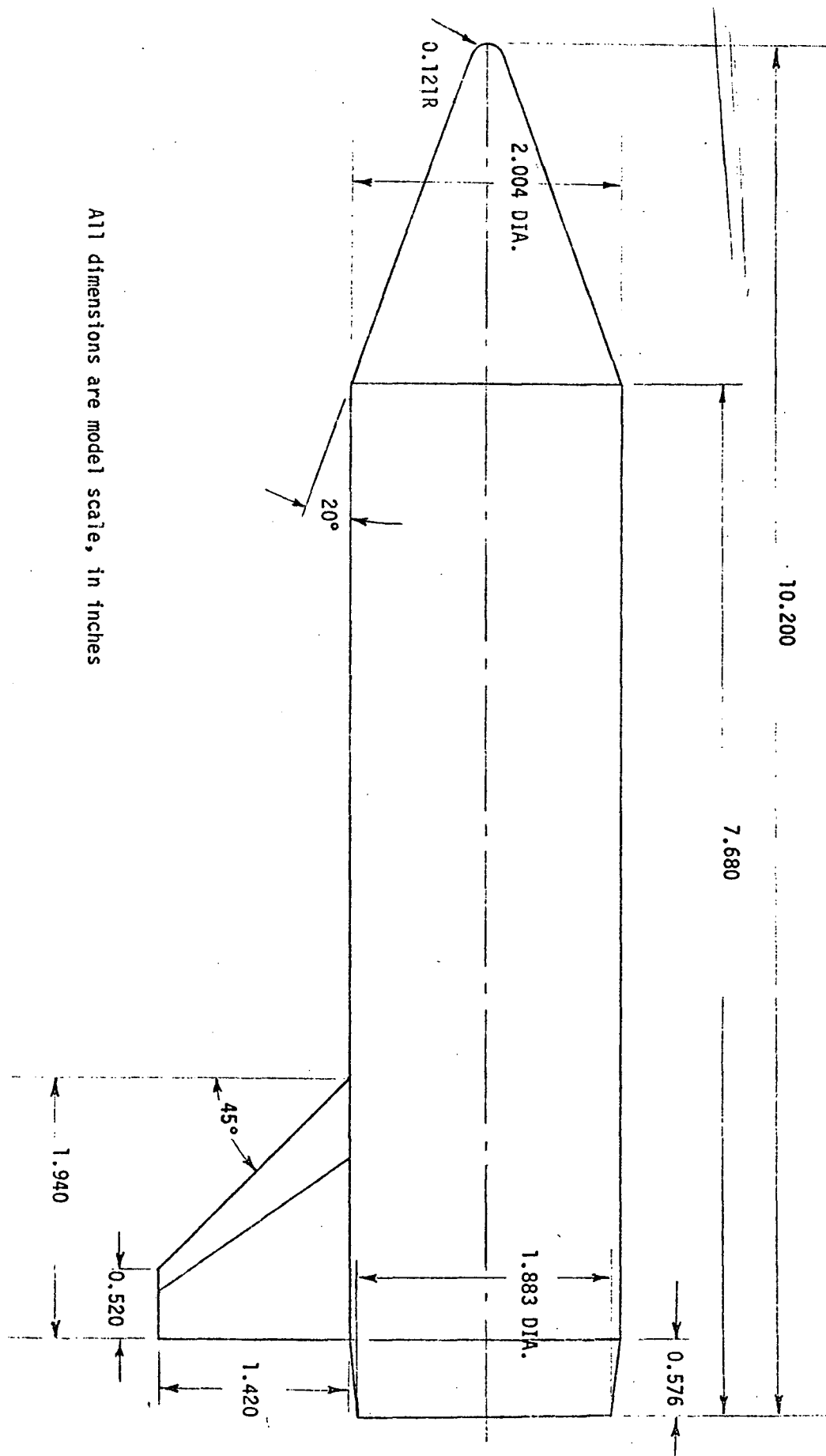
HO TANK, T 3



All dimensions are model scale, in inches.

Figure 29. Centerline HO Tank, T3

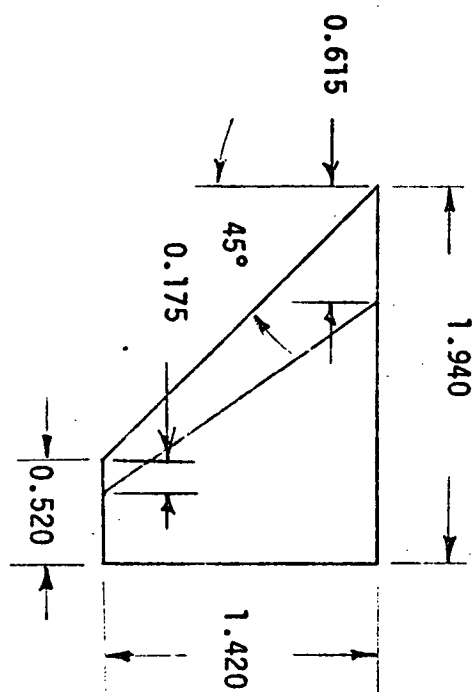
TANK T₄ WITH TANK VENTRAL FIN, F₁



All dimensions are model scale, in inches

Figure 30. Centerline HO Tank T₄ With Tank Ventral Fin, F₁

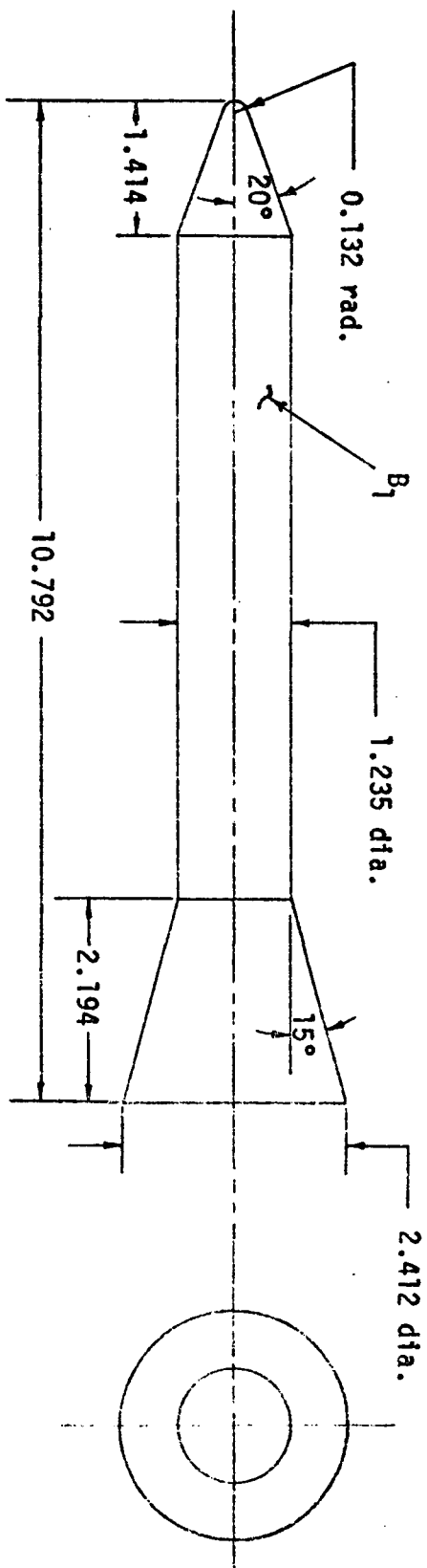
TANK VENTRAL FIN, F_1



All dimensions are model scale, in inches

Figure 31. Centerline Ventral Fin, F_1

BOOSTER, B₁ & B₅



118

All dimensions are model scale, in inches.

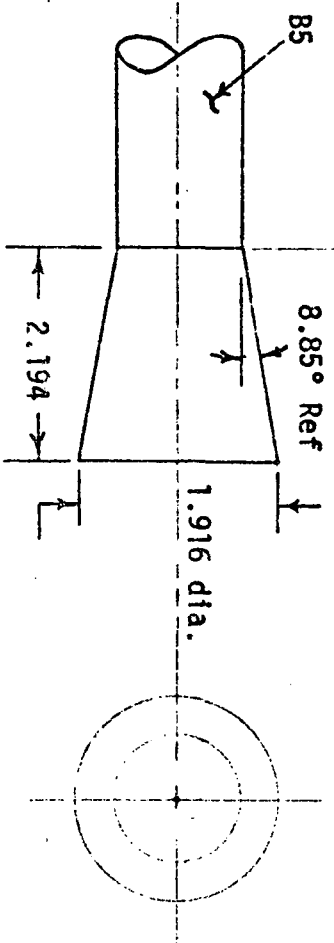


Figure 32. Boosters, B₁ and B₅

B₁S₁

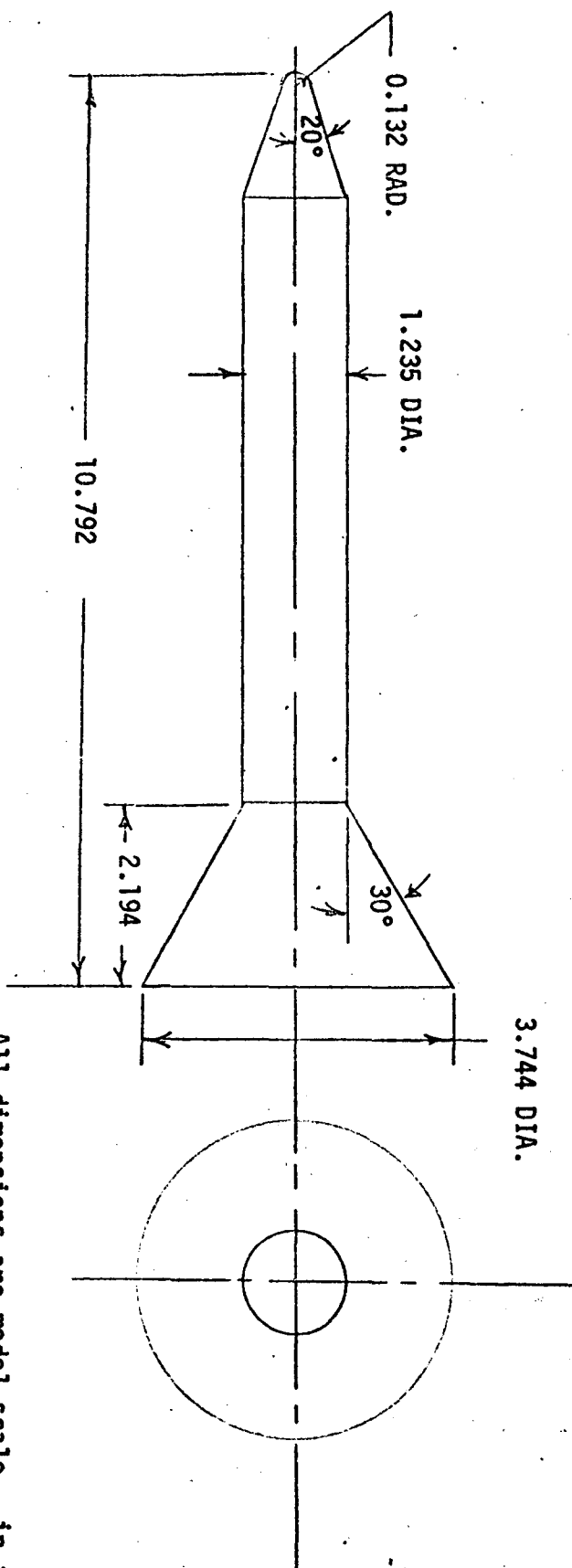
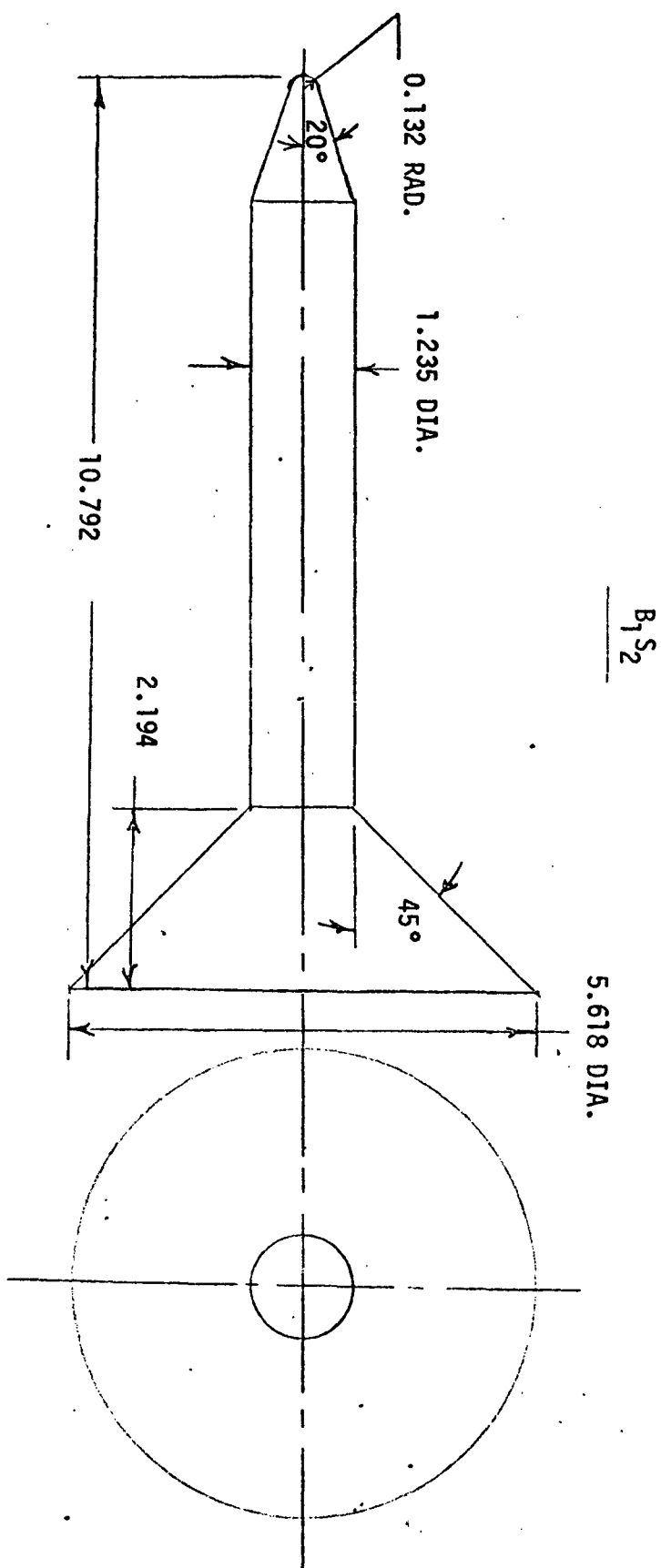


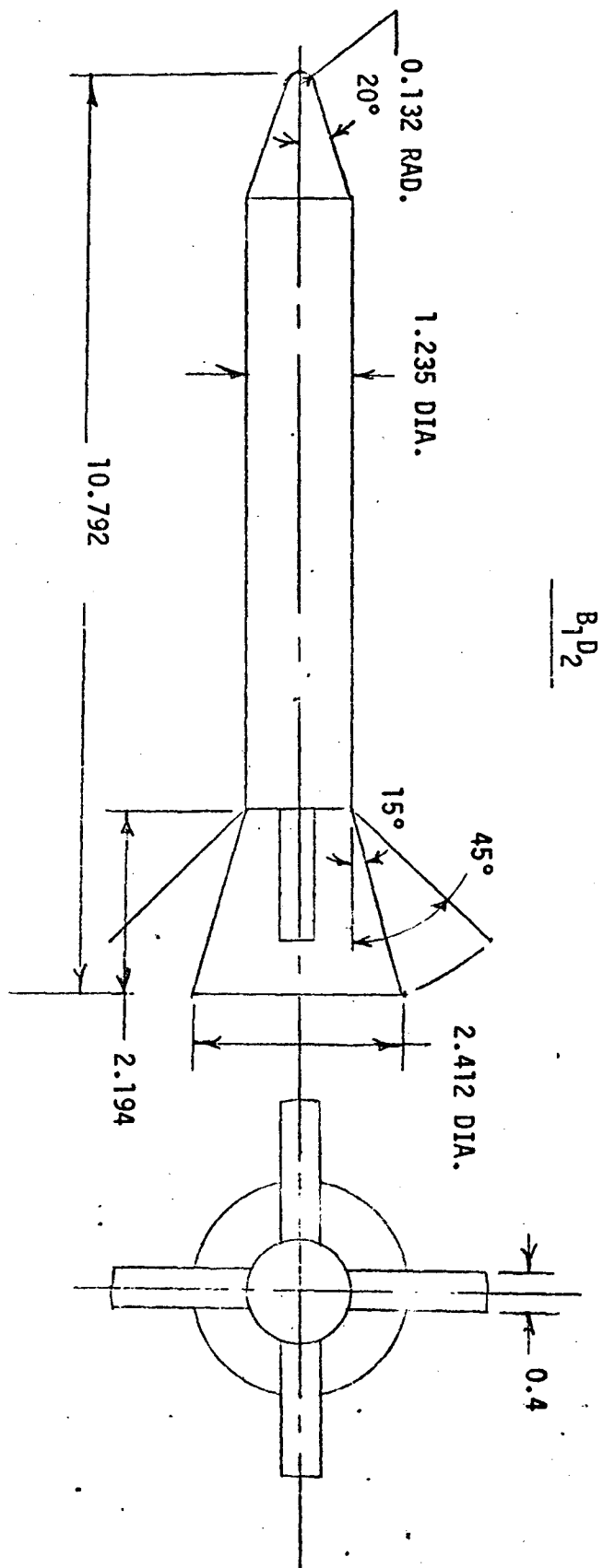
Figure 33. Booster, B₁S₁

All dimensions are model scale , in inches



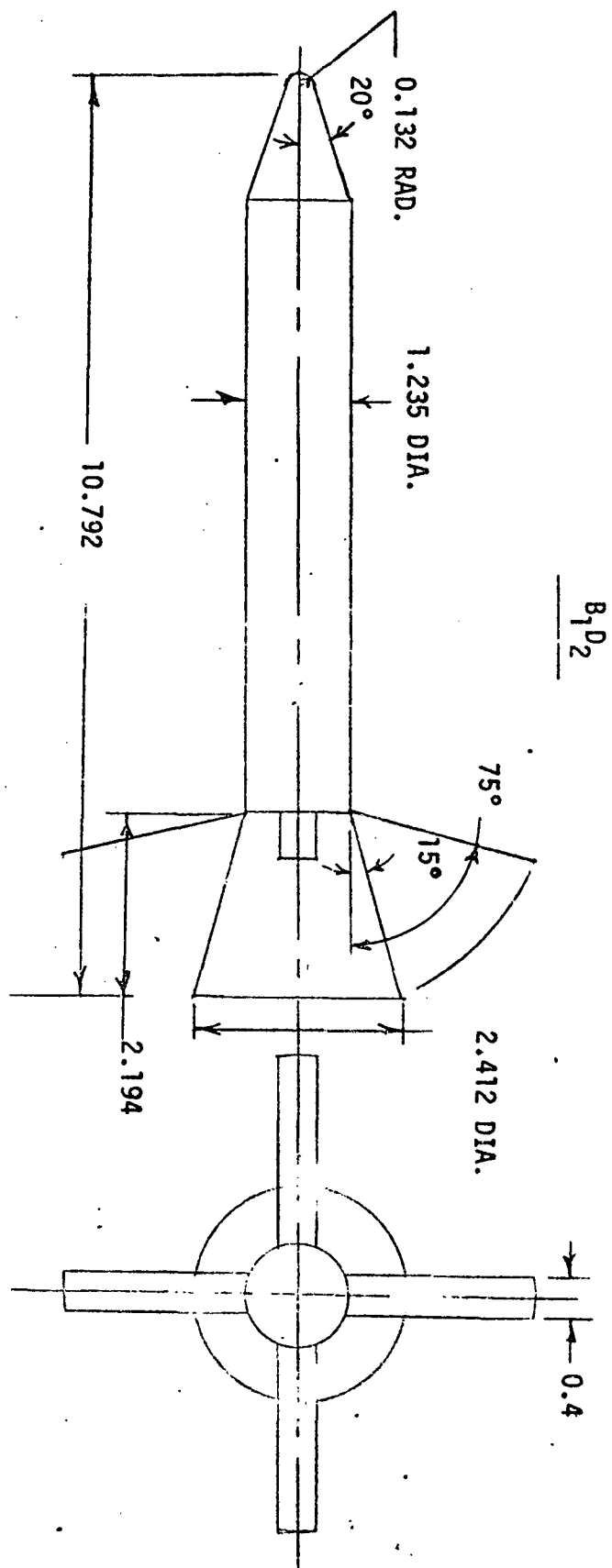
All dimensions are model scale, in inches

Figure 34. Booster, B₁S₂



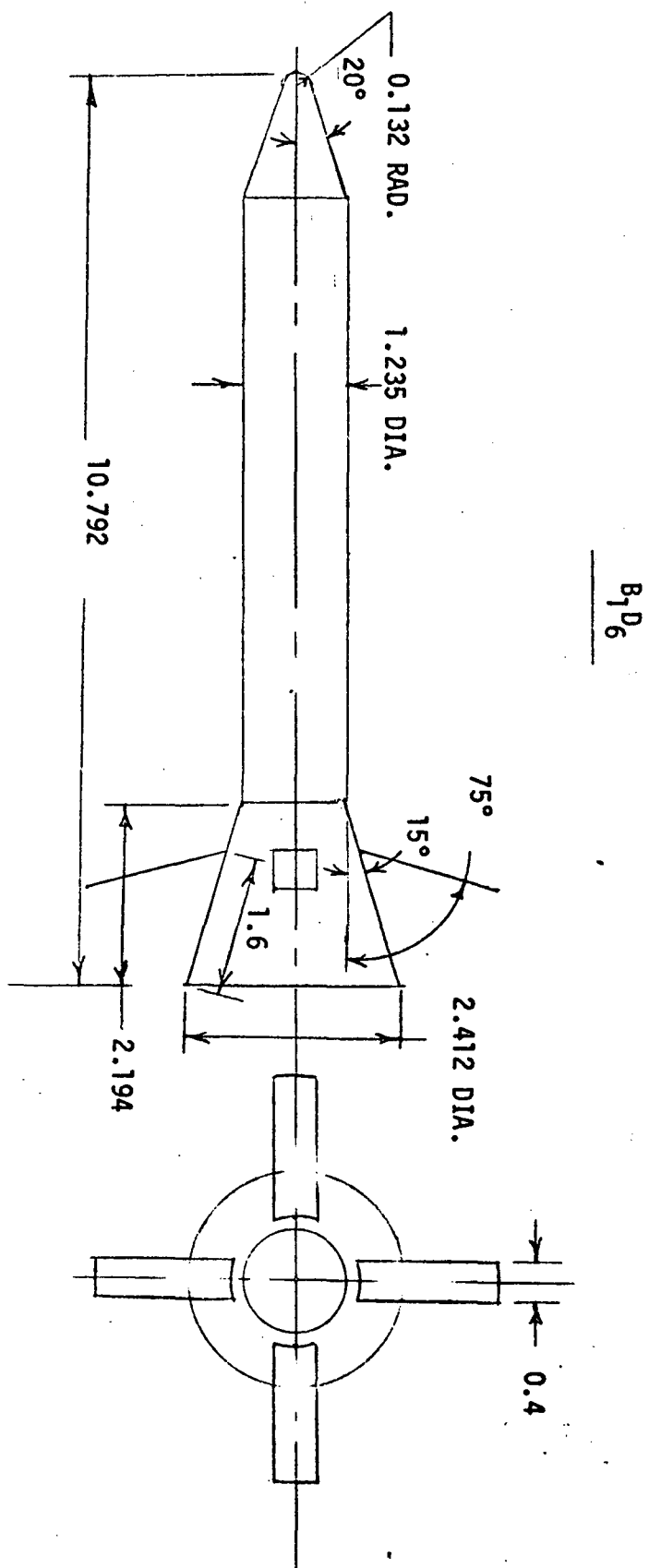
All dimensions are model scale, in inches

Figure 35. Booster, B_1D_2



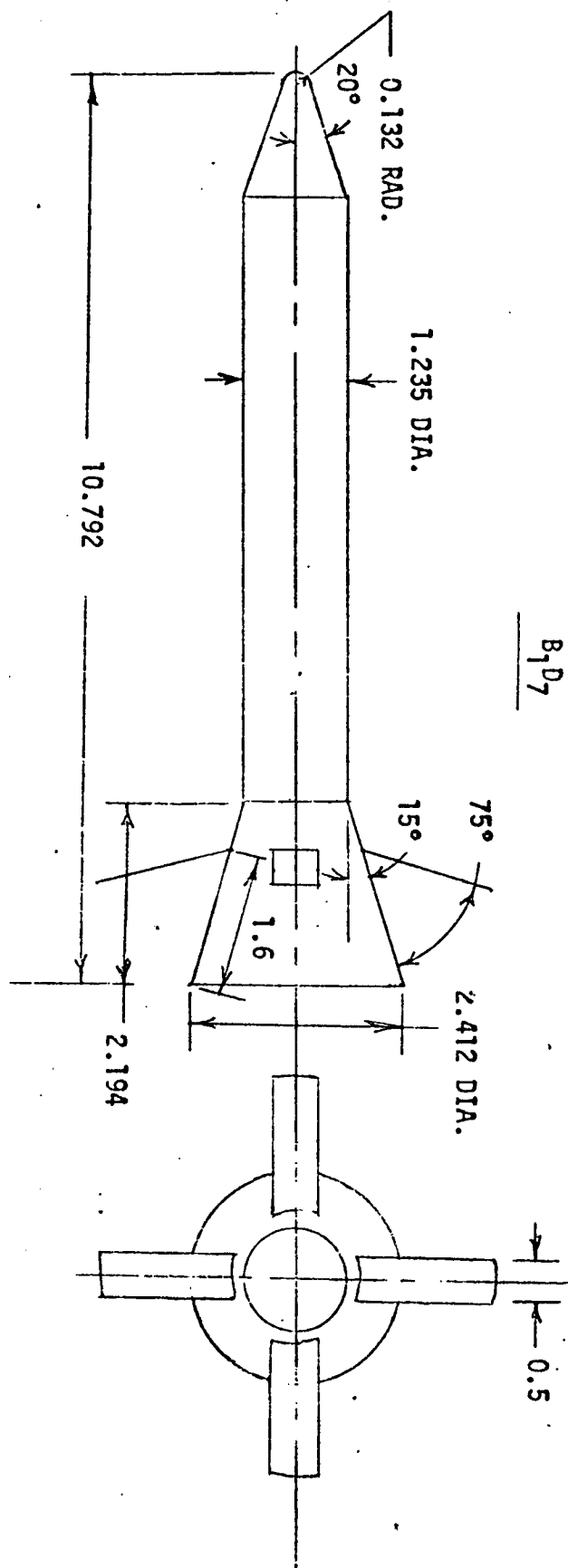
All dimensions are model scale, in inches

Figure 35. (Continued)



All dimensions are model scale, in inches

Figure 36. Booster, B_1D_6



All dimensions are model scale, in inches

Figure 37. Booster, B_1D_7

BOOSTERS, B_2 & B_2S & B_6

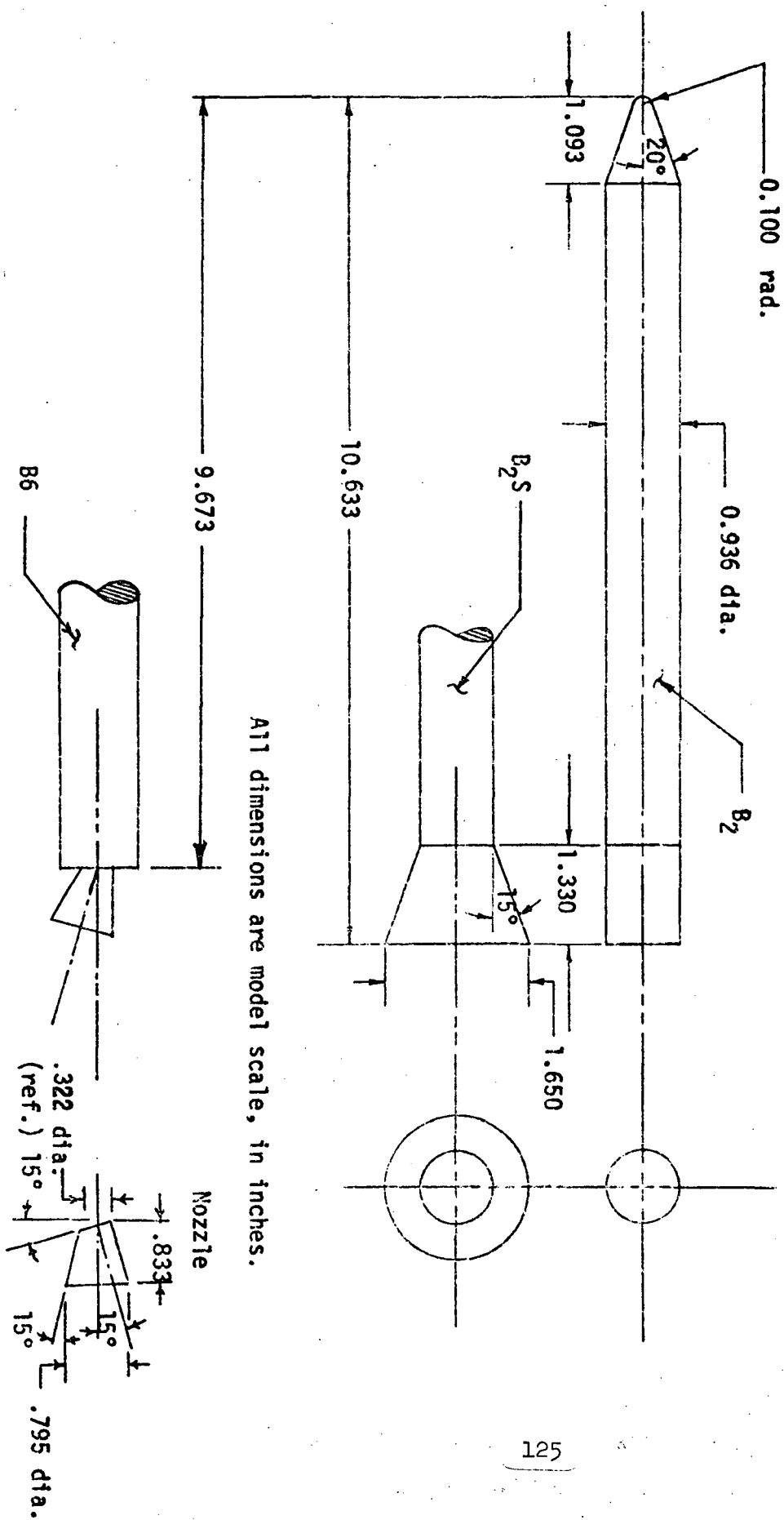
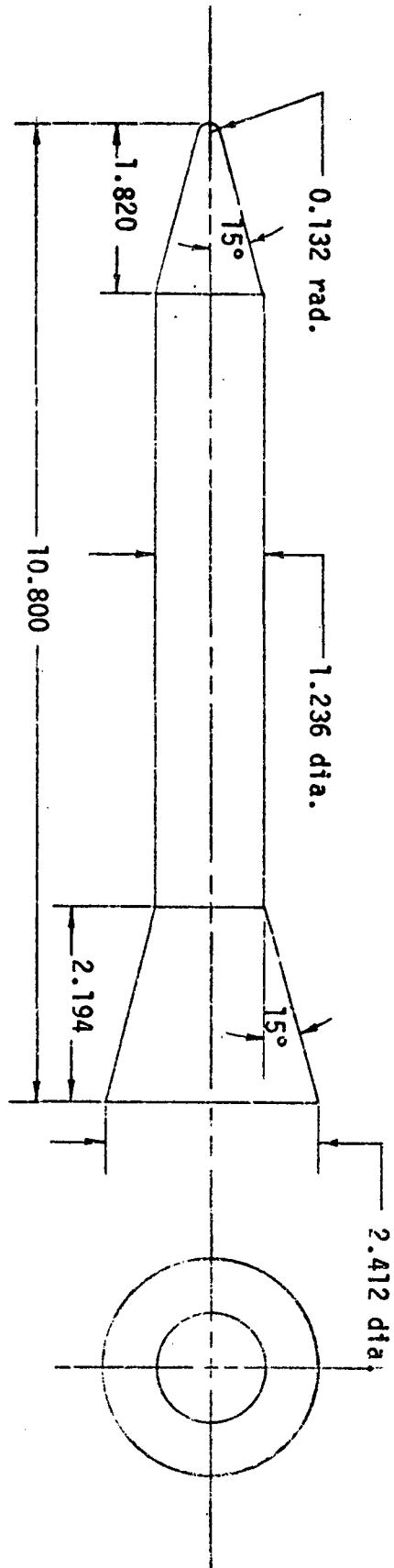


Figure 38. Boosters, B_2 , B_2S & B_6

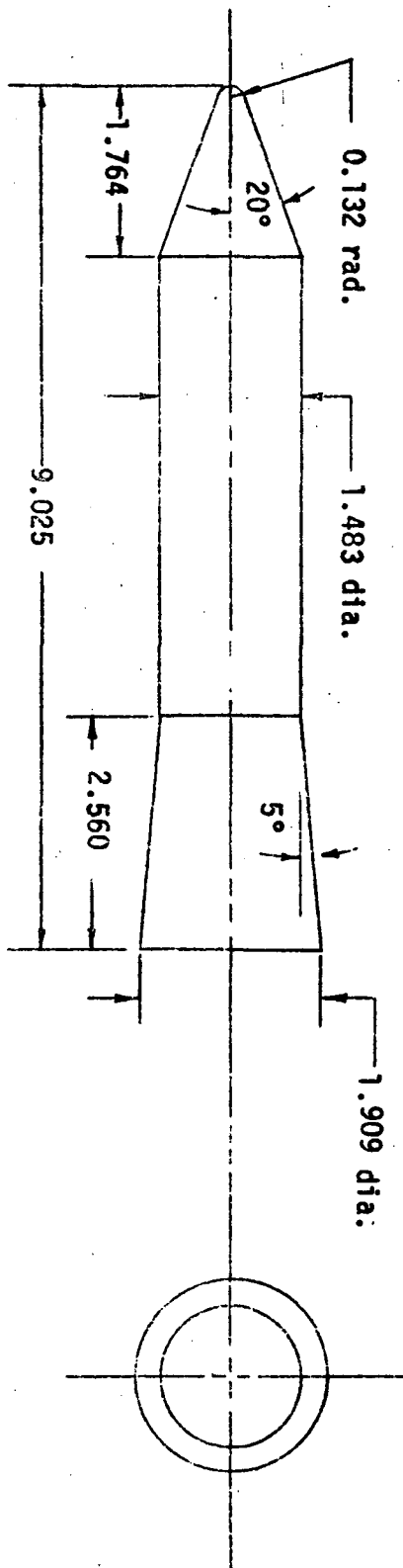
BOOSTER, B₃



All dimensions are model scale, in inches.

Figure 39. Booster, B₃

BOOSTER, B₄



All dimensions are model scale, in inches.

Figure 40. Booster, B₄

FIN, F_4
 ited on Booster, B_4)

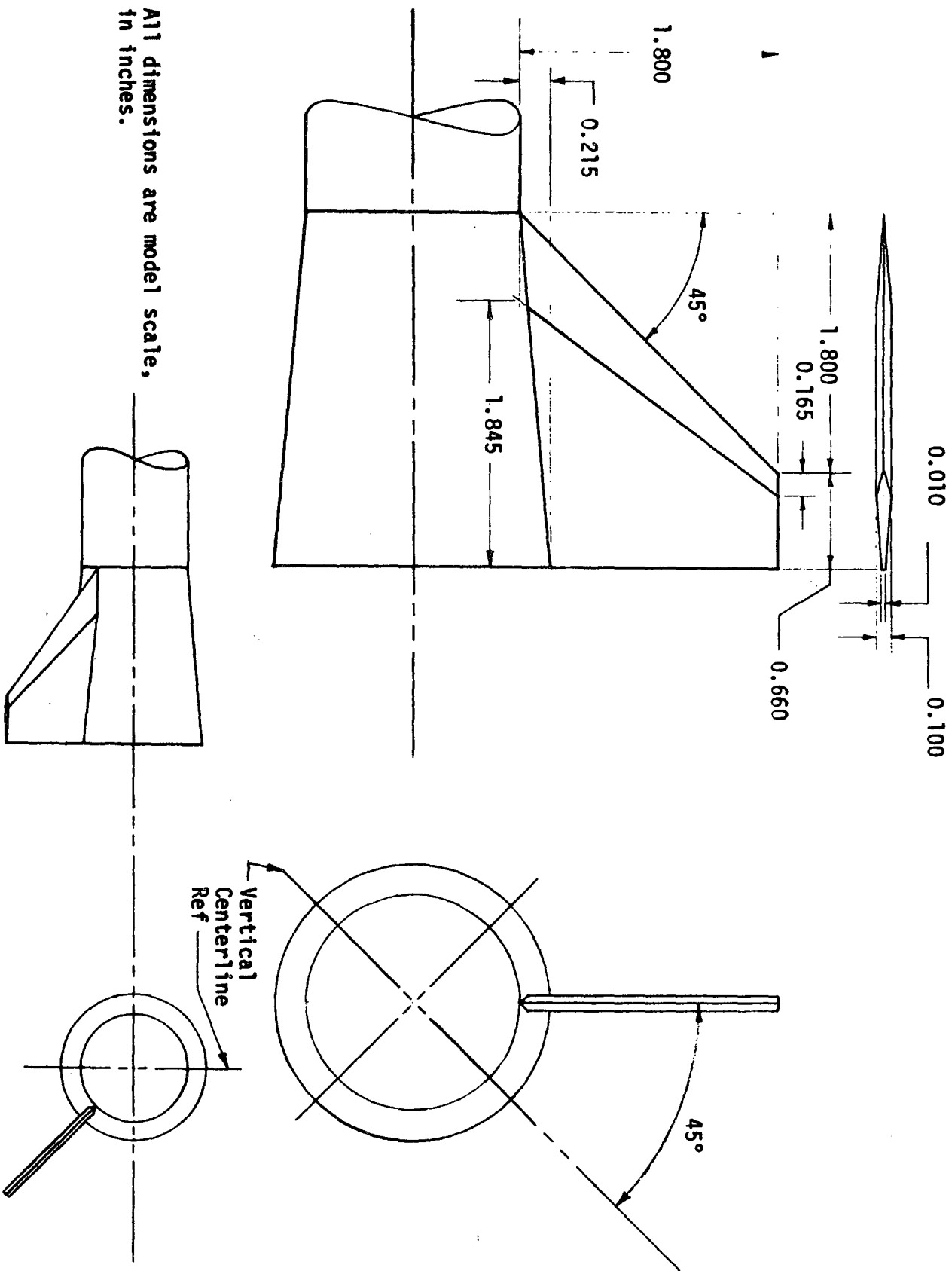


Figure 41. Booster F1n F_l Mounted on Booster B_l

PREPARED BY: _____
 CHECKED BY: _____
 DATE: _____
 TITLE: _____

DIVISION _____

PAGE: _____
 MODEL: _____
 REPORT NO: _____

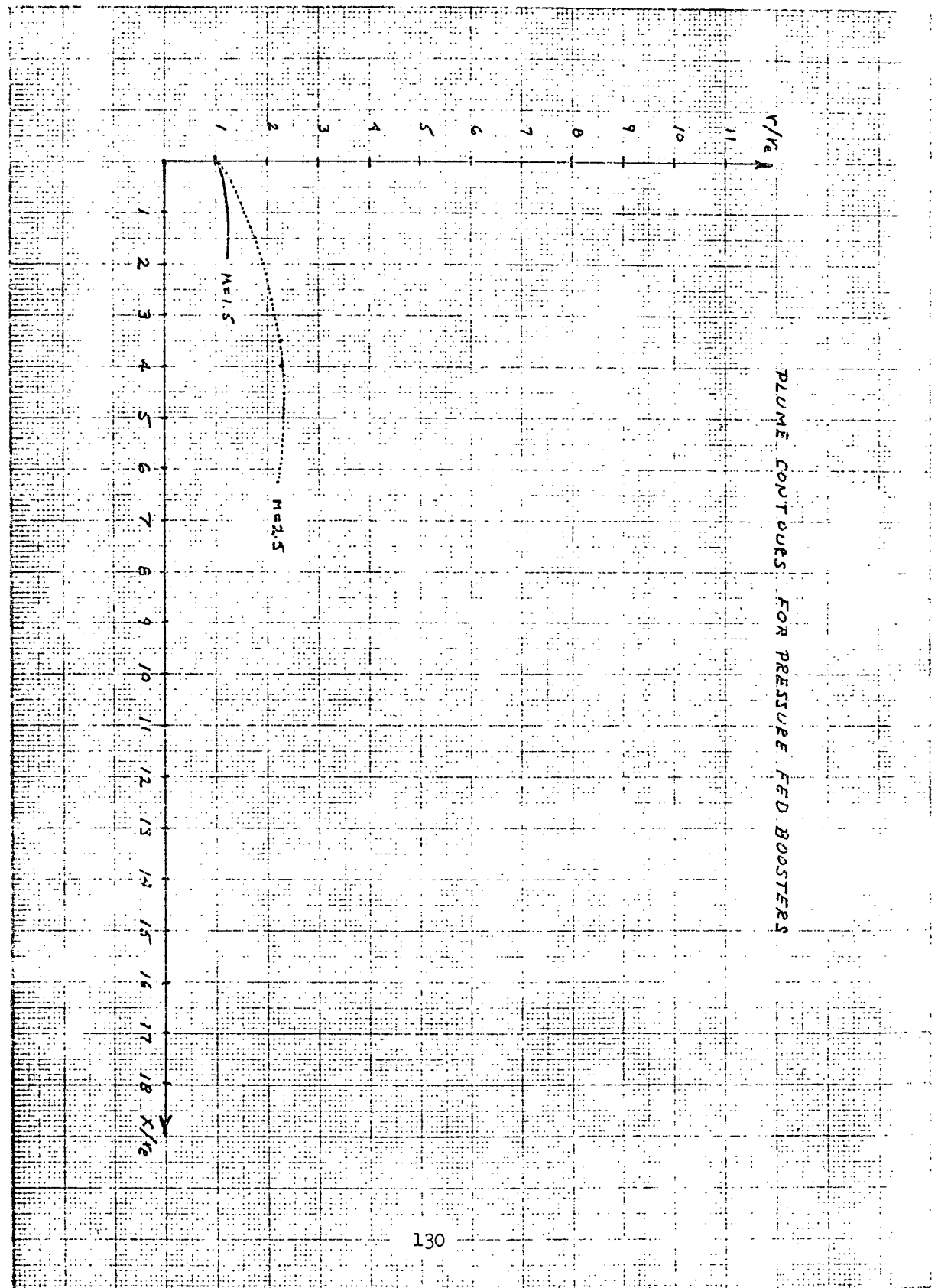


Figure 43. Plume Contours for Pressure Fed Boosters

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CHECKED BY: _____

DATE: _____

TITLE: _____

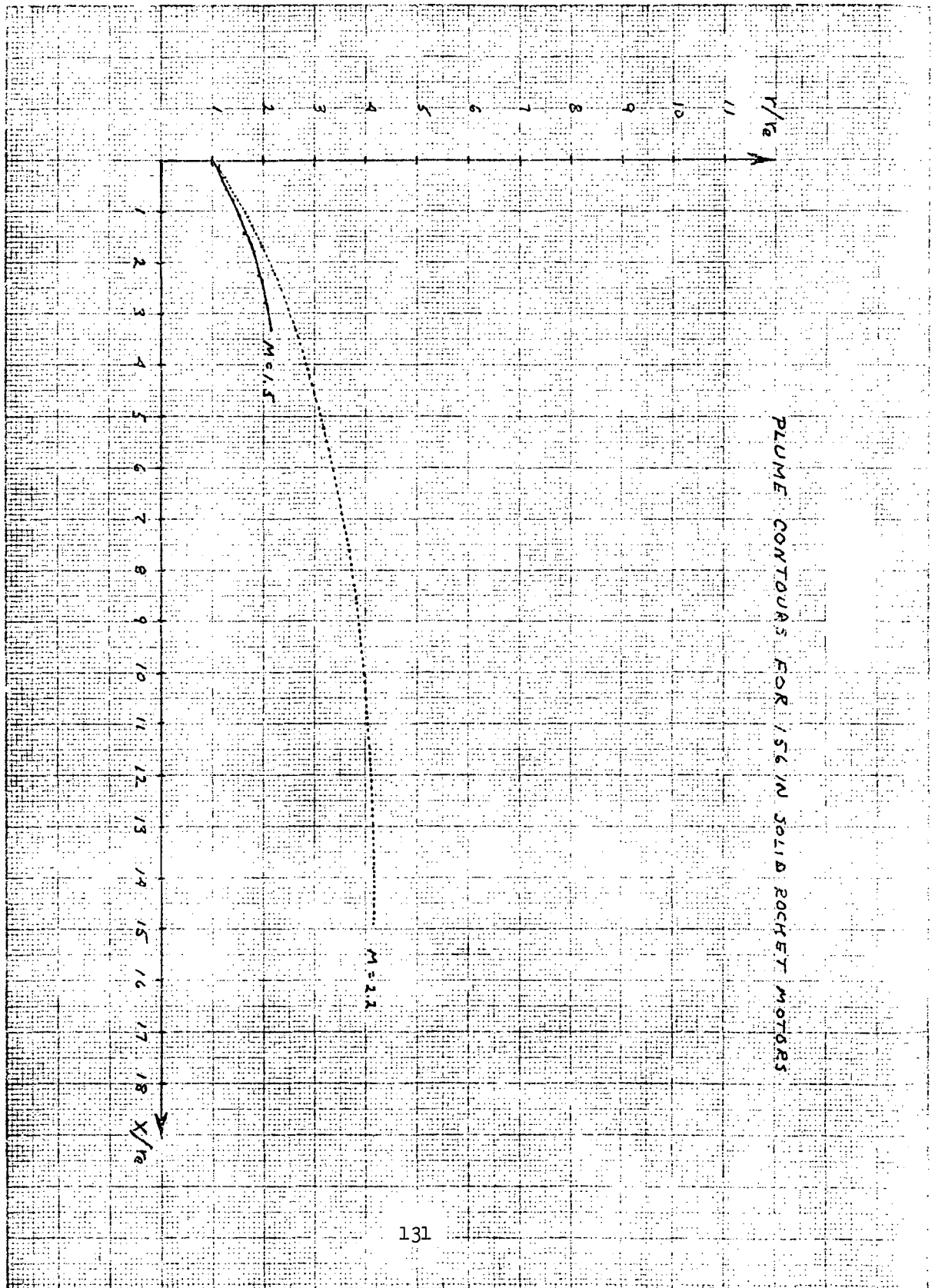
PAGE: _____

DIVISION _____

MODEL: _____

REPORT NO.: _____

Figure 44. Plume Contours for 156 Inch Solid Rocket Motors



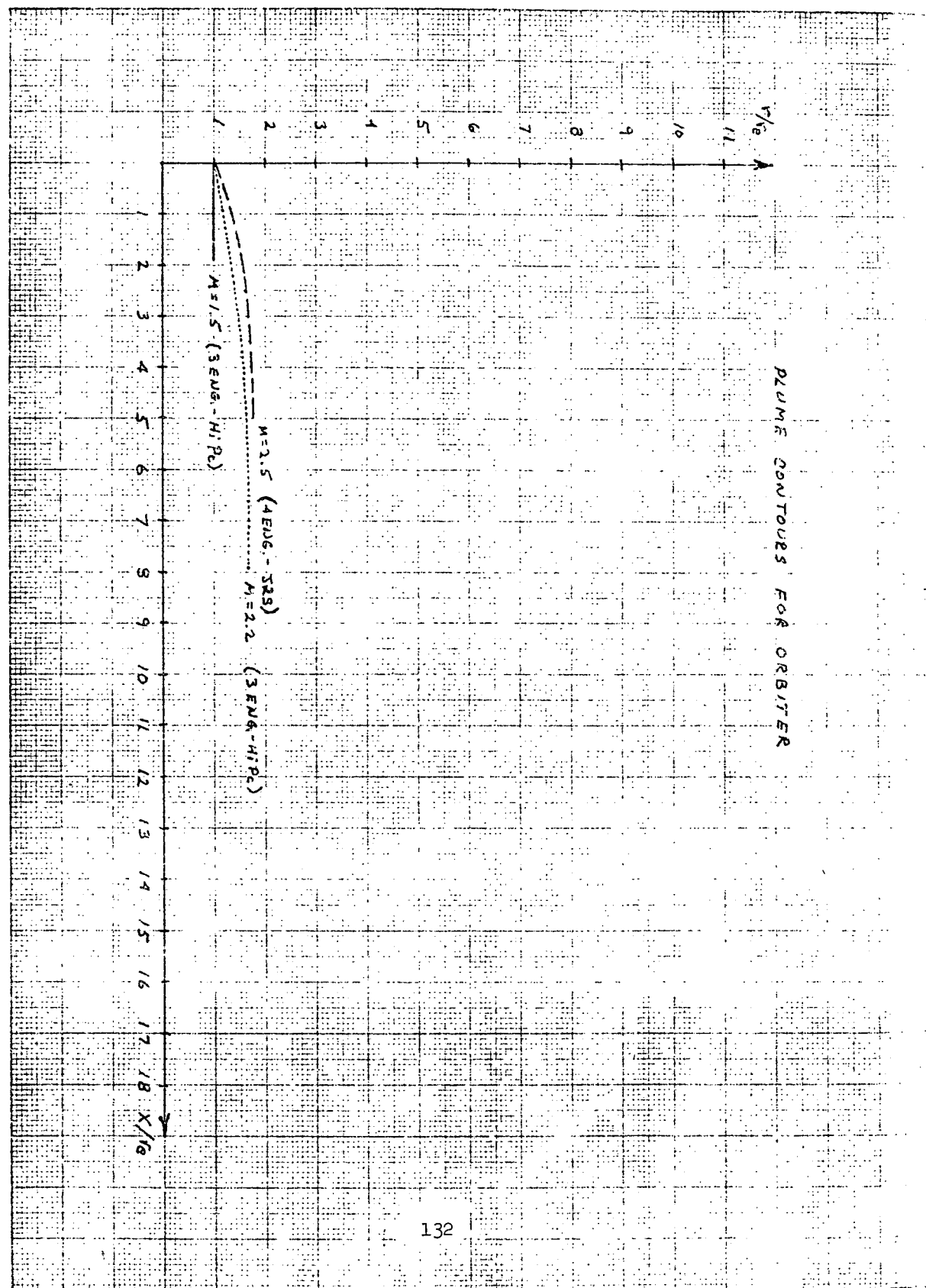
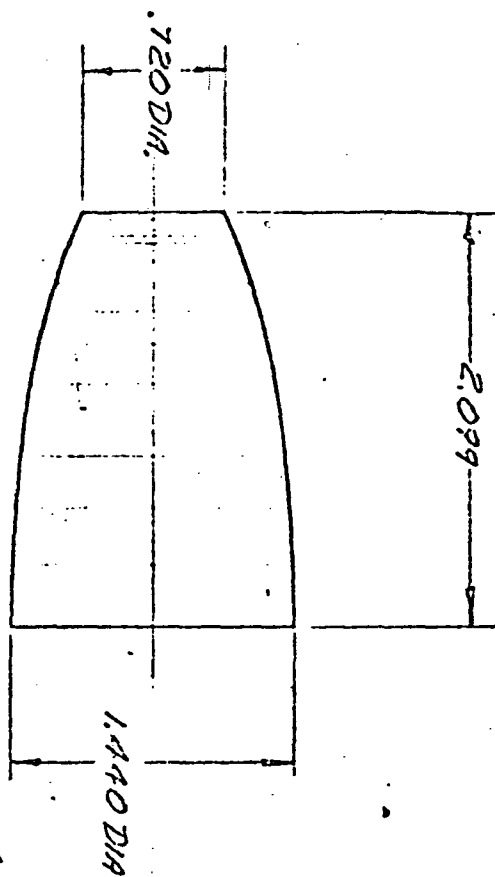


Figure 45. Plume Contour for Orbiter

M1.5 PLUME - B₇ BOOSTER



M2.2 PLUME - B₇ BOOSTER

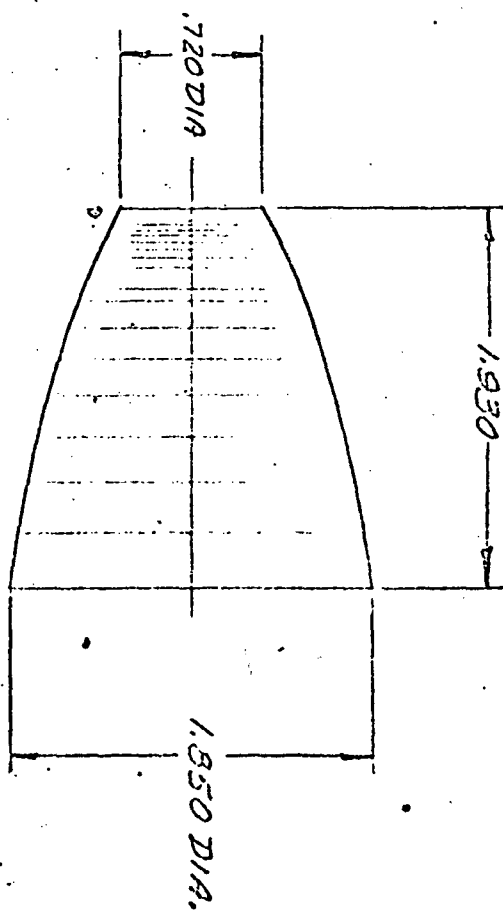
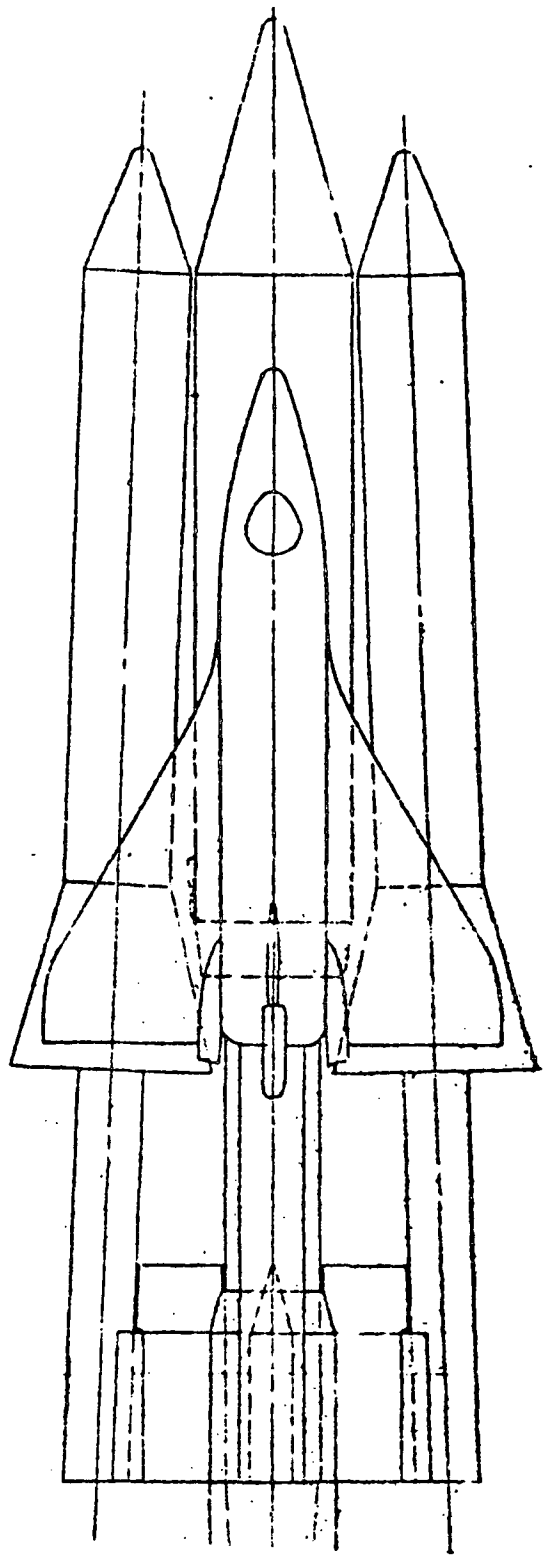


Figure 46. Sketch of Plume for Booster B₇



MODEL SUPPORT SYSTEM DETAIL

Configuration shown
provides independent
support for boosters
tank and orbiter.

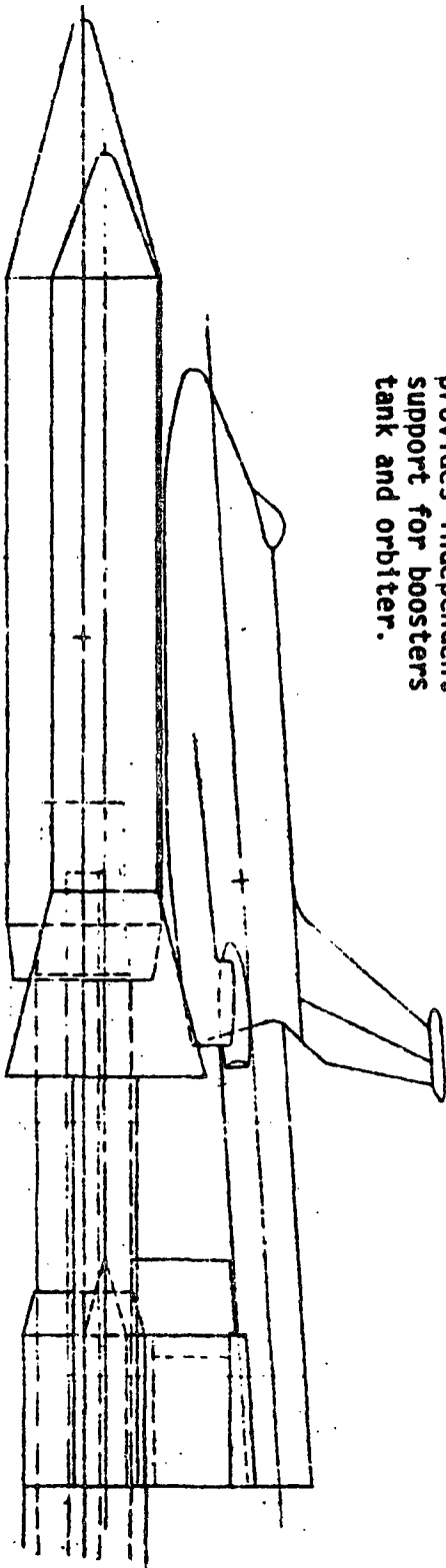
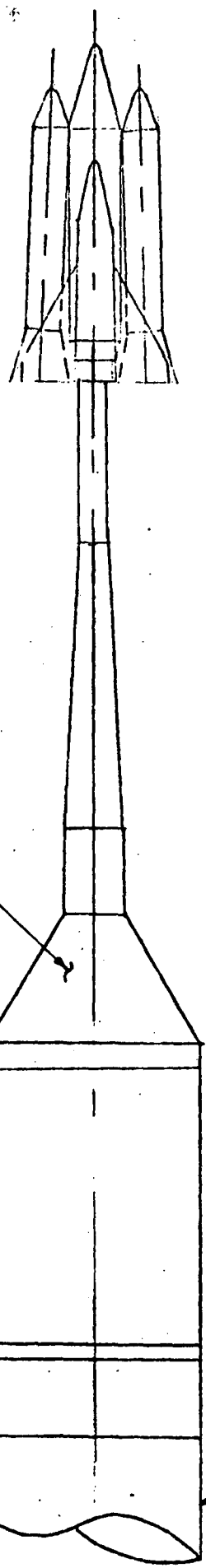


Figure 47. Tunnel Installation for the OBT Configuration-Pitch Series
(Orbiter, Tank and Booster Independently Supported)

TUNNEL INSTALLATION FOR THE OBT CONFIGURATION PITCH SERIES

Boosters and Orbiter fixed to centerline tank.

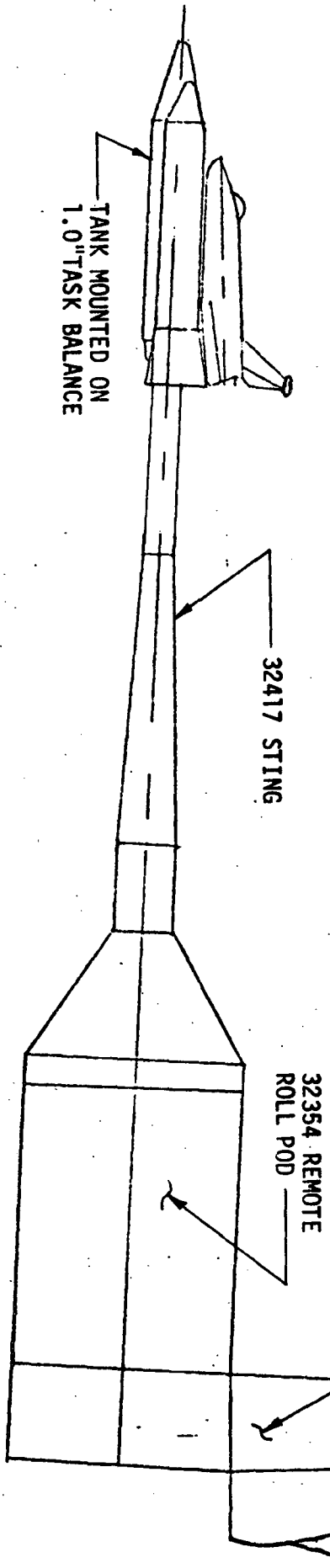


3484 POD

3777-3 ADAPTER

TOP

32717 6 DEG.
POD ADAPTER



32417 STING

32354 REMOTE
ROLL POD

TANK MOUNTED ON
1.0" TASK BALANCE

SIDE

Figure 48. Tunnel Installation for the OBT Configuration-Pitch Series
(Booster and Orbiter Fixed to Centerline Tank)

TUNNEL INSTALLATION FOR THE OBT CONFIGURATION PITCH SERIES

Boosters fixed to centerline tank.

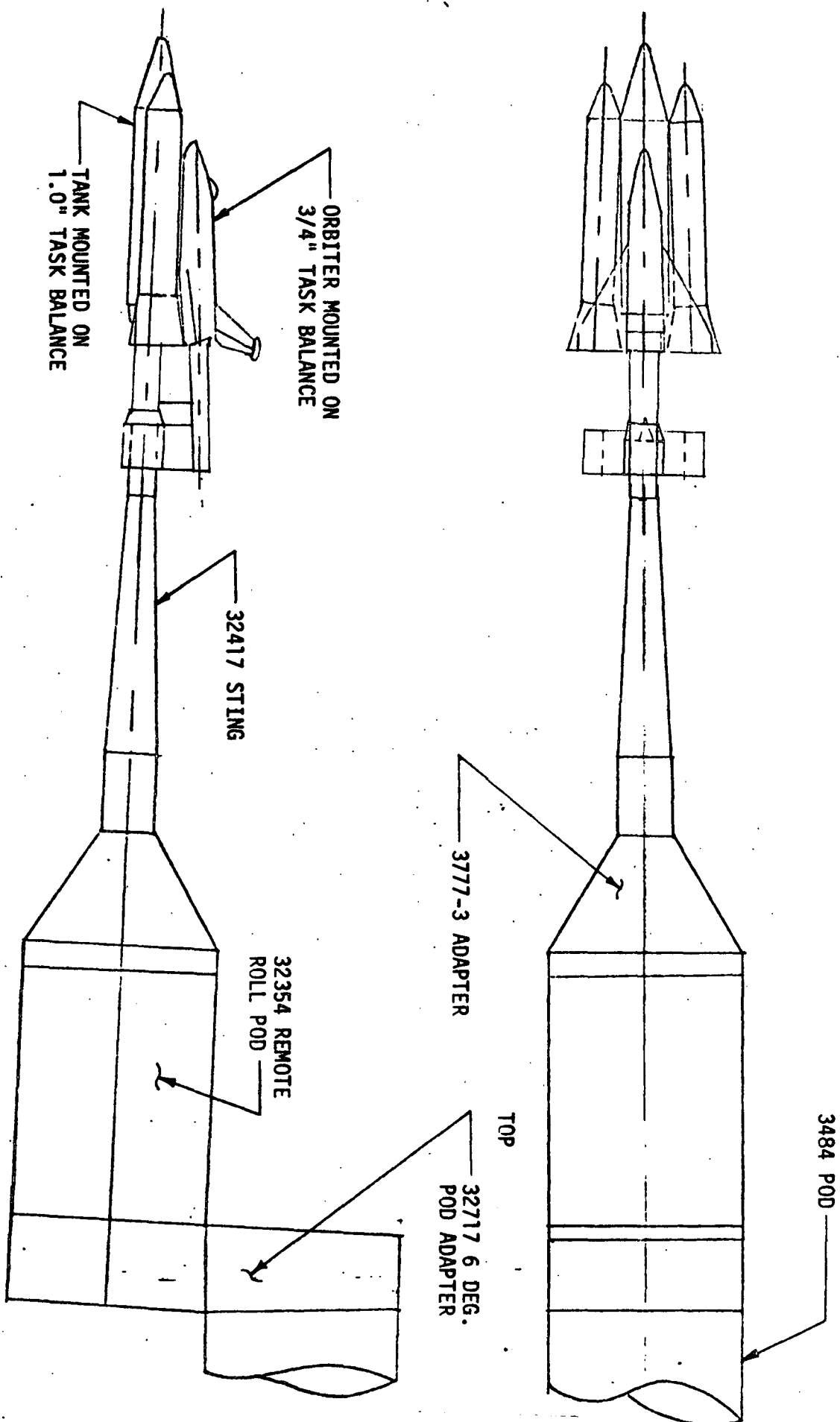


Figure 49. Tunnel Installation for the OBT Configuration-Pitch Series
(Booster Fixed to Centerline Tank)

TUNNEL INSTALLATION FOR THE OBT CONFIGURATION PITCH SERIES

Right Booster fixed to centerline tank, left Booster Independently supported.

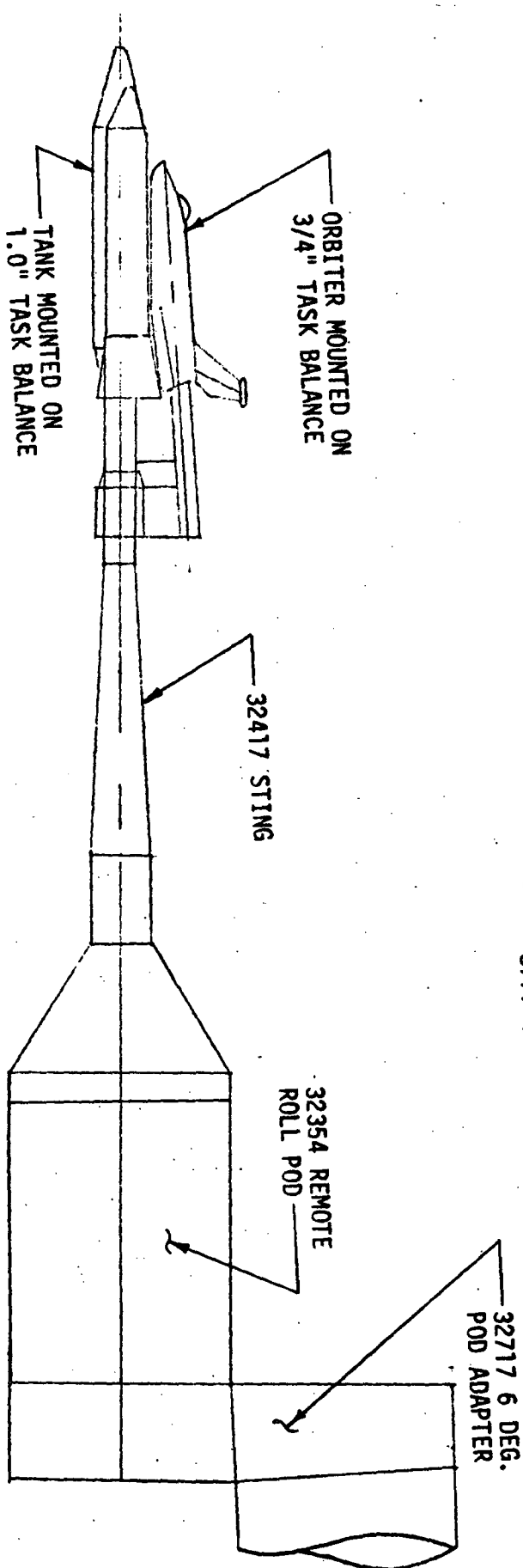
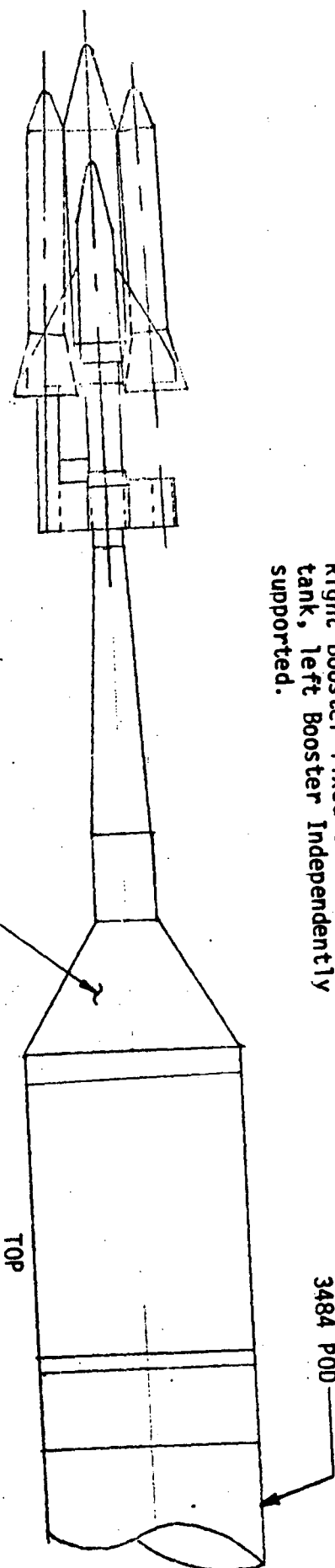


Figure 50. Tunnel Installation for the OBT Configuration-Pitch Series
(Right Booster Fixed to Centerline Tank, Left Booster
Independently Supported)

TUNNEL INSTALLATION FOR THE OBT CONFIGURATION PITCH SERIES

Left and Right boosters independently supported with centerline tank, T1 in forward position.

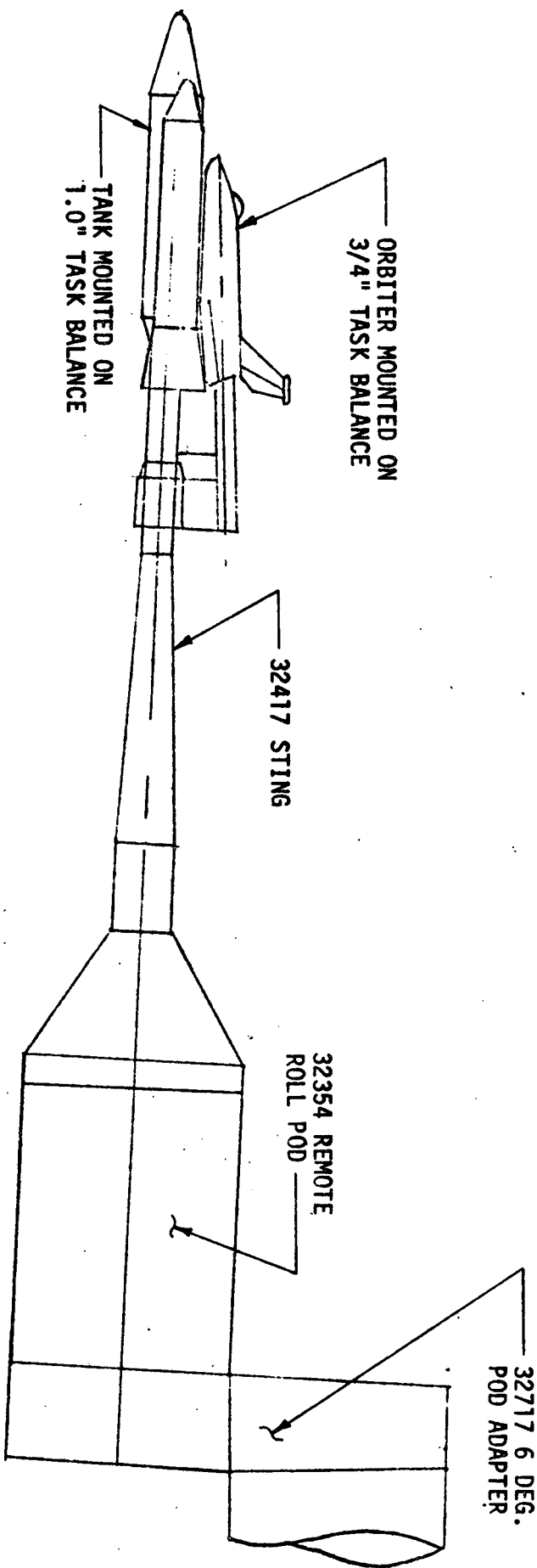
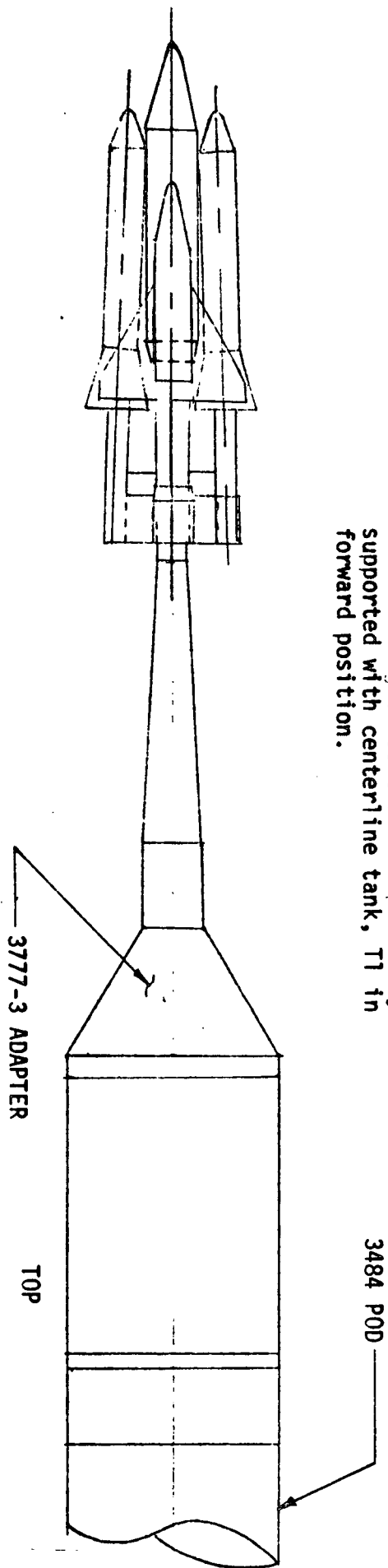


Figure 51. Tunnel Installation for the OBT Configuration-Pitch Series
(Left and Right Booster Independently Supported)

TUNNEL INSTALLATION FOR THE OBT CONFIGURATION PITCH SERIES

6° Sideslip Angle
Boosters fixed to centerline tank

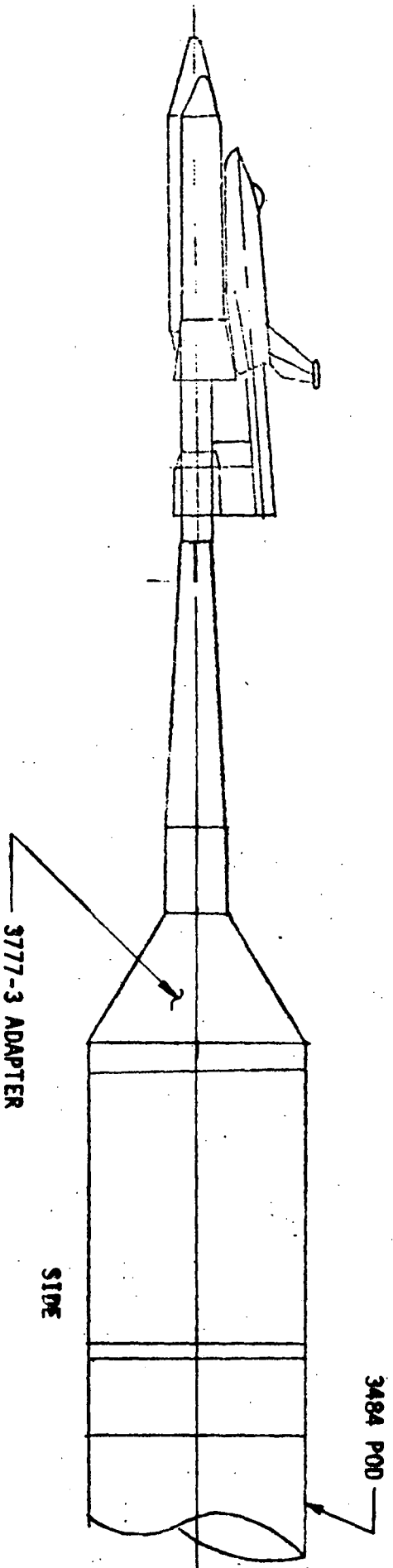
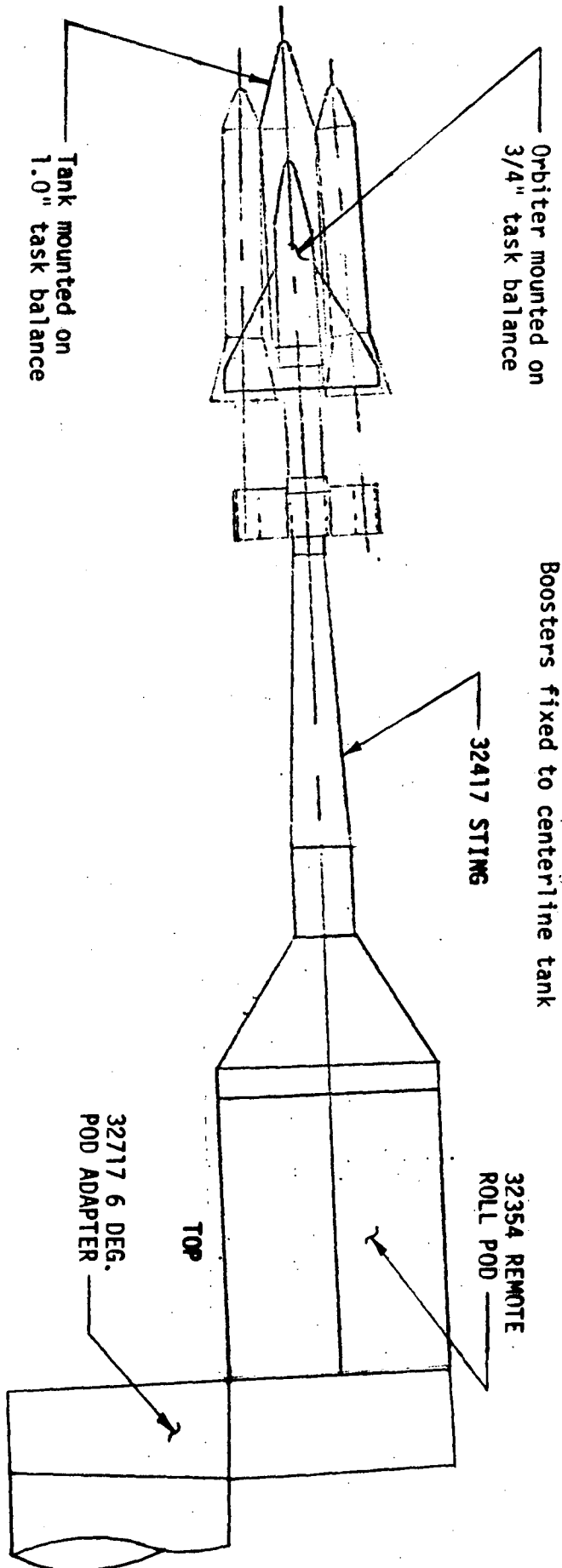


Figure 52. Tunnel Installation for the OBT Configuration With 6° Sideslip Angle-Pitch Series (Boosters Fixed to Centerline Tank)

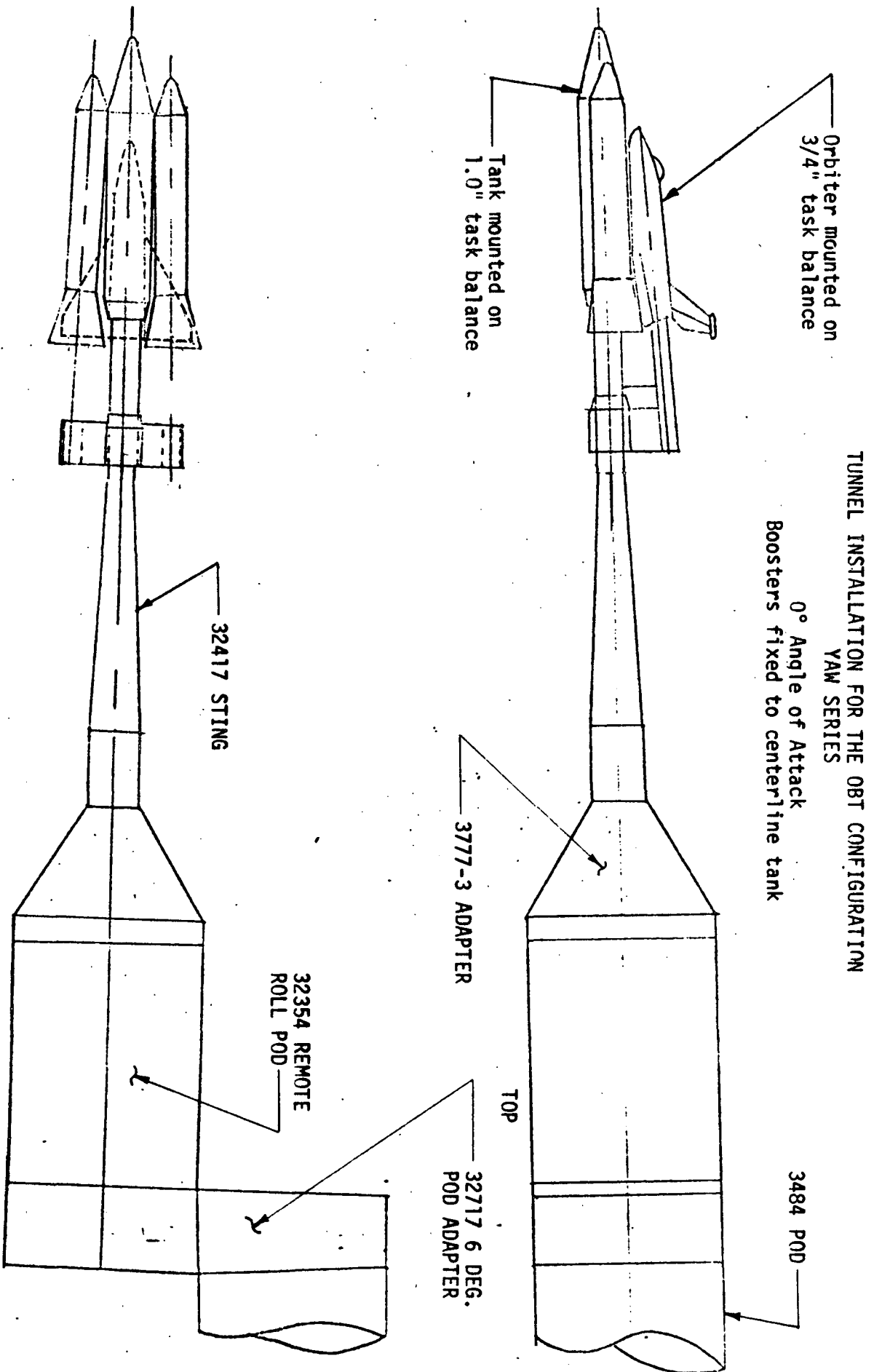


Figure 53. Tunnel Installation for the OBT Configuration With 0° Angle of Attack-Yaw Series (Boosters Fixed to Centerline Tank)

TUNNEL INSTALLATION FOR THE OBT CONFIGURATION YAW SERIES

6° Angle of Attack
Boosters fixed to centerline tank

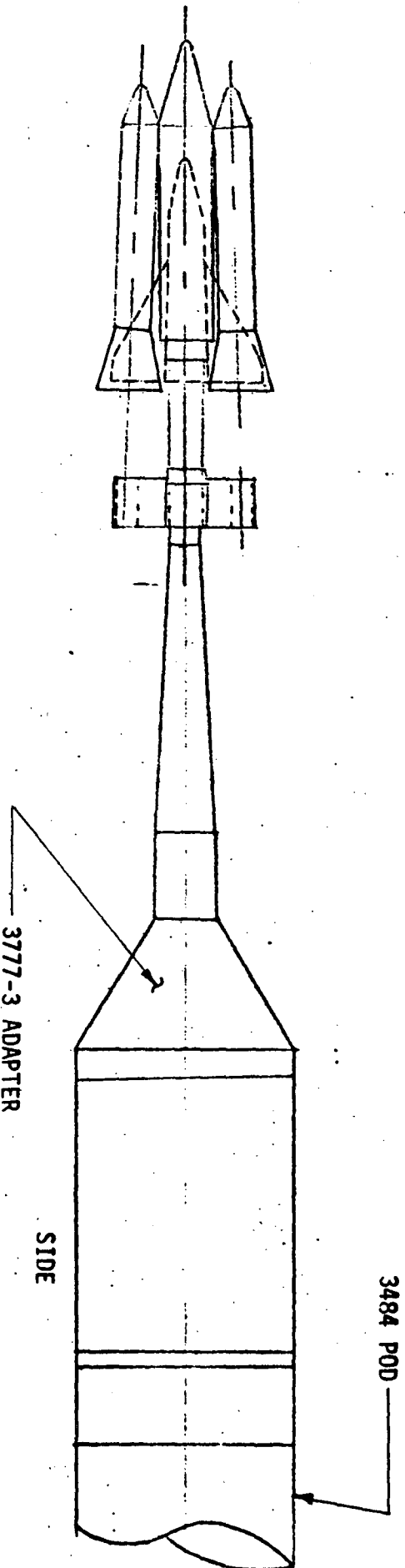
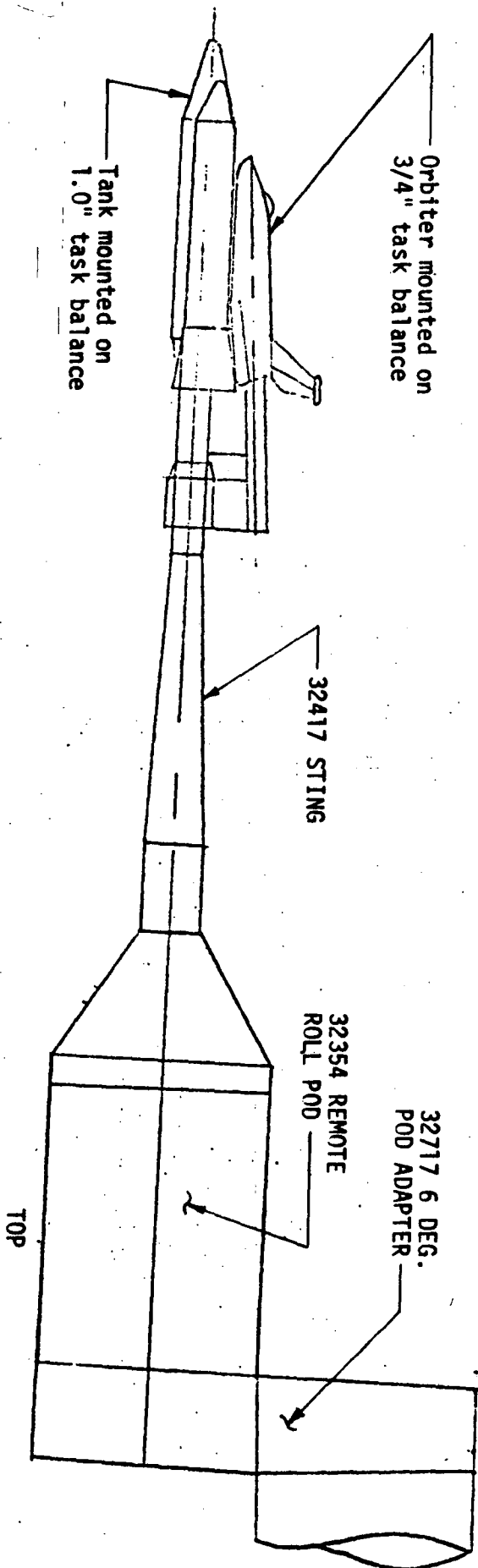


Figure 54. Tunnel Installation for the OBT Configuration With 6° Angle of Attack-Yaw Series (Boosters Fixed to the Centerline Tank)

TUNNEL INSTALLATION FOR THE OBT CONFIGURATION
PITCH SERIES
Orbiter alone

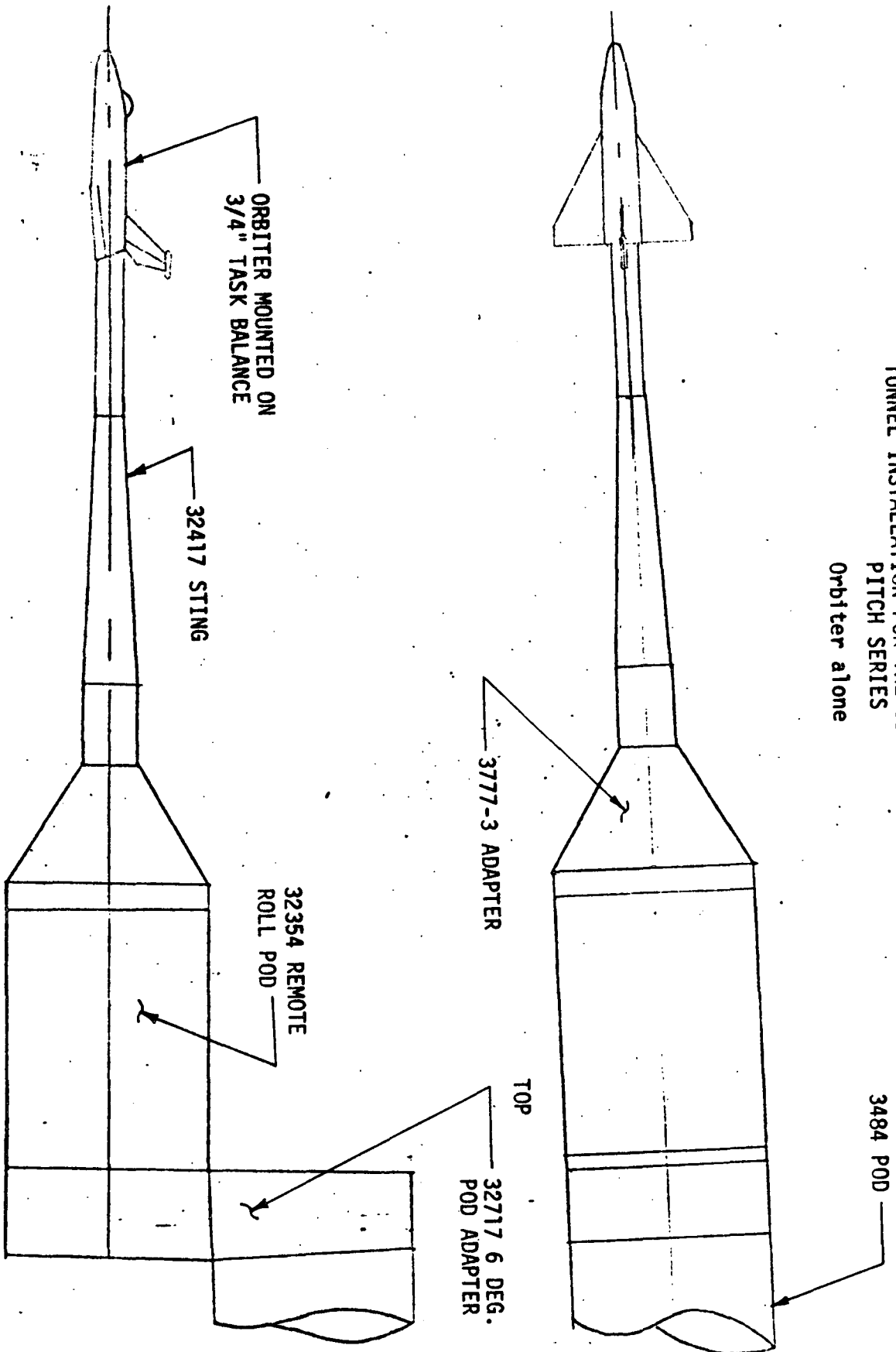
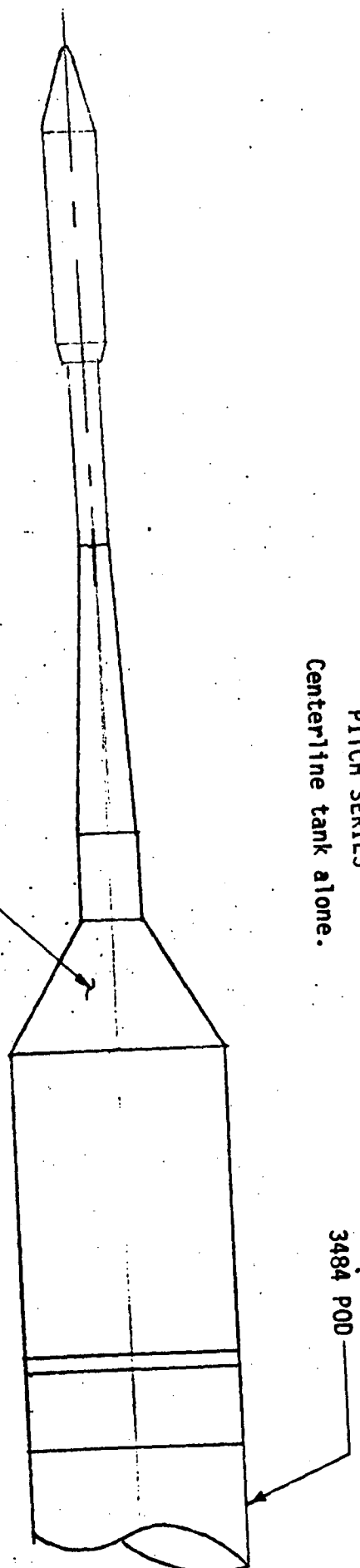


Figure 55. Tunnel Installation for the Orbiter Alone Configuration

TUNNEL INSTALLATION FOR THE OBT CONFIGURATION PITCH SERIES

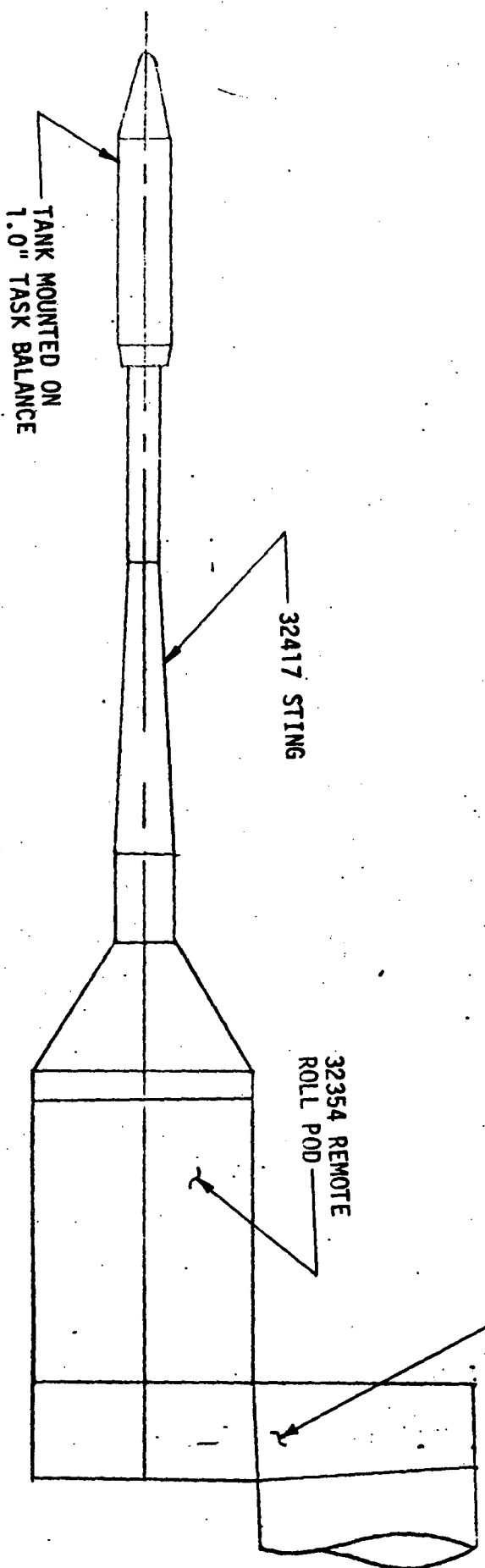
Centerline tank alone.



TOP

32717 6 DEG.
POD ADAPTER

143



SIDE

Figure 56. Tunnel Installation for the Tank Alone Configuration

TUNNEL INSTALLATION FOR THE OBT CONFIGURATION
PITCH SERIES
Booster alone

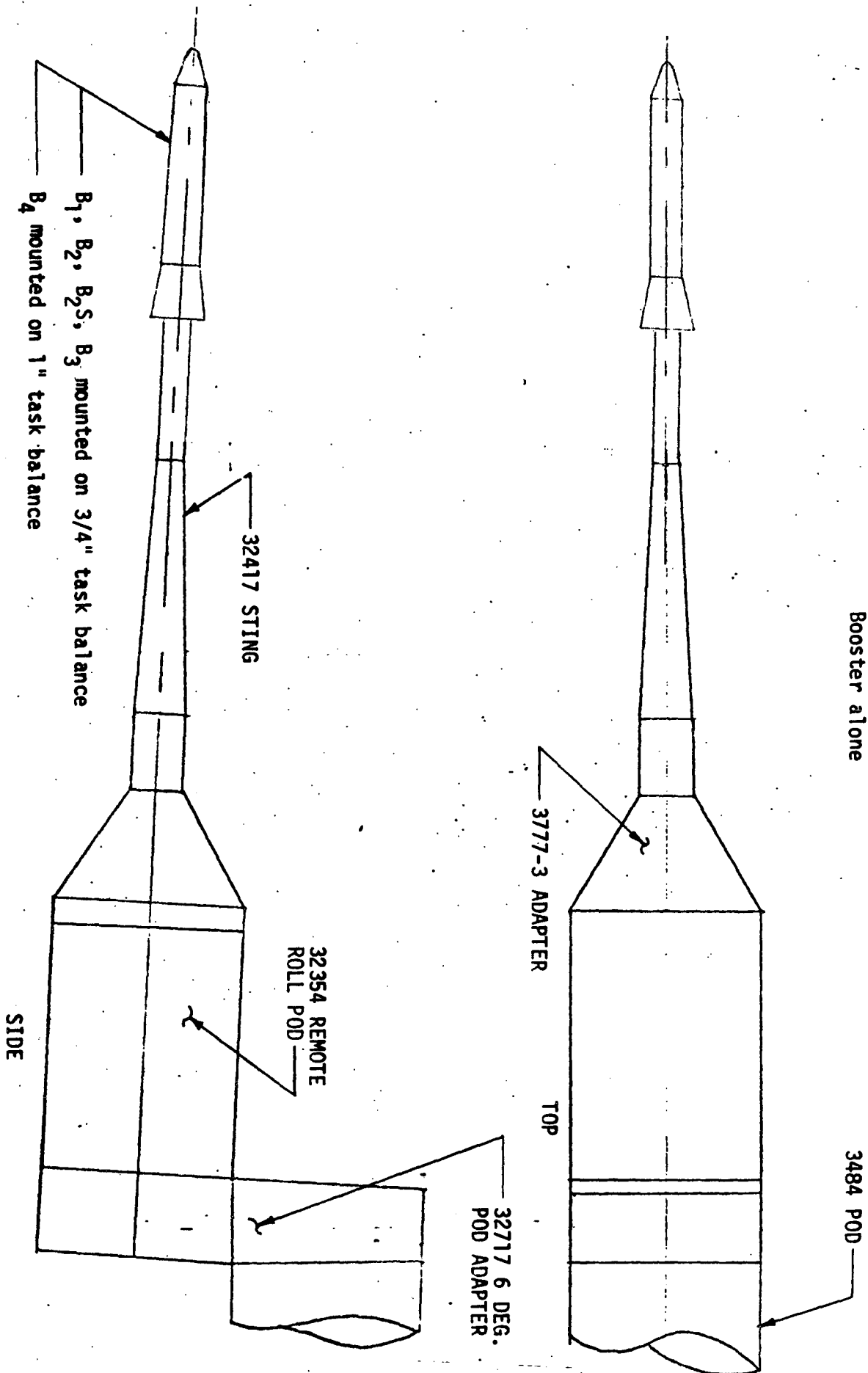
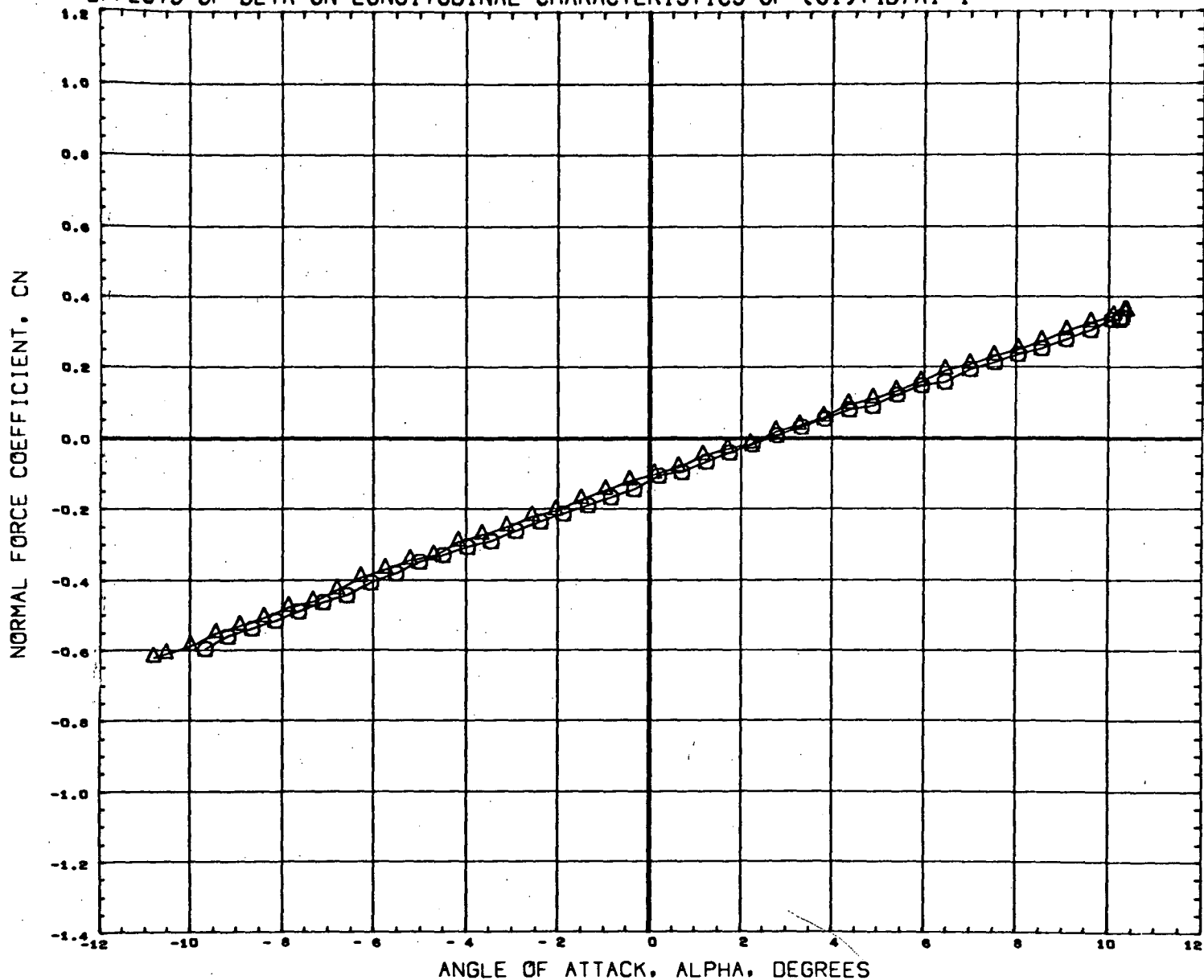


Figure 57. Tunnel Installation for the Booster Alone Configuration

DATA FIGURES

Tabulations of the plotted data and corresponding source data are available from SADSAC Operations.

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4

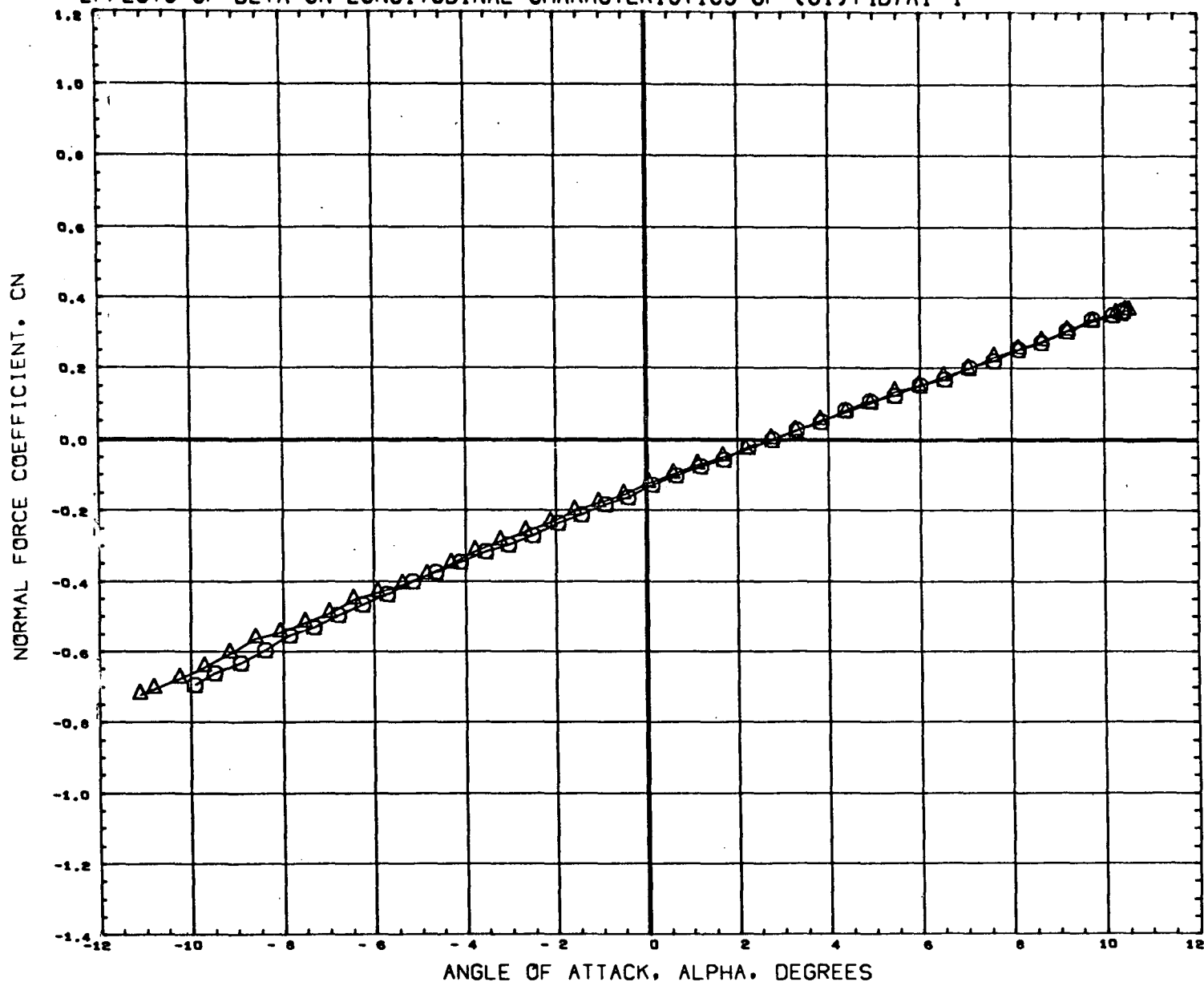


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| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 682.0004 IN. |
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| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

PAGE 1

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4

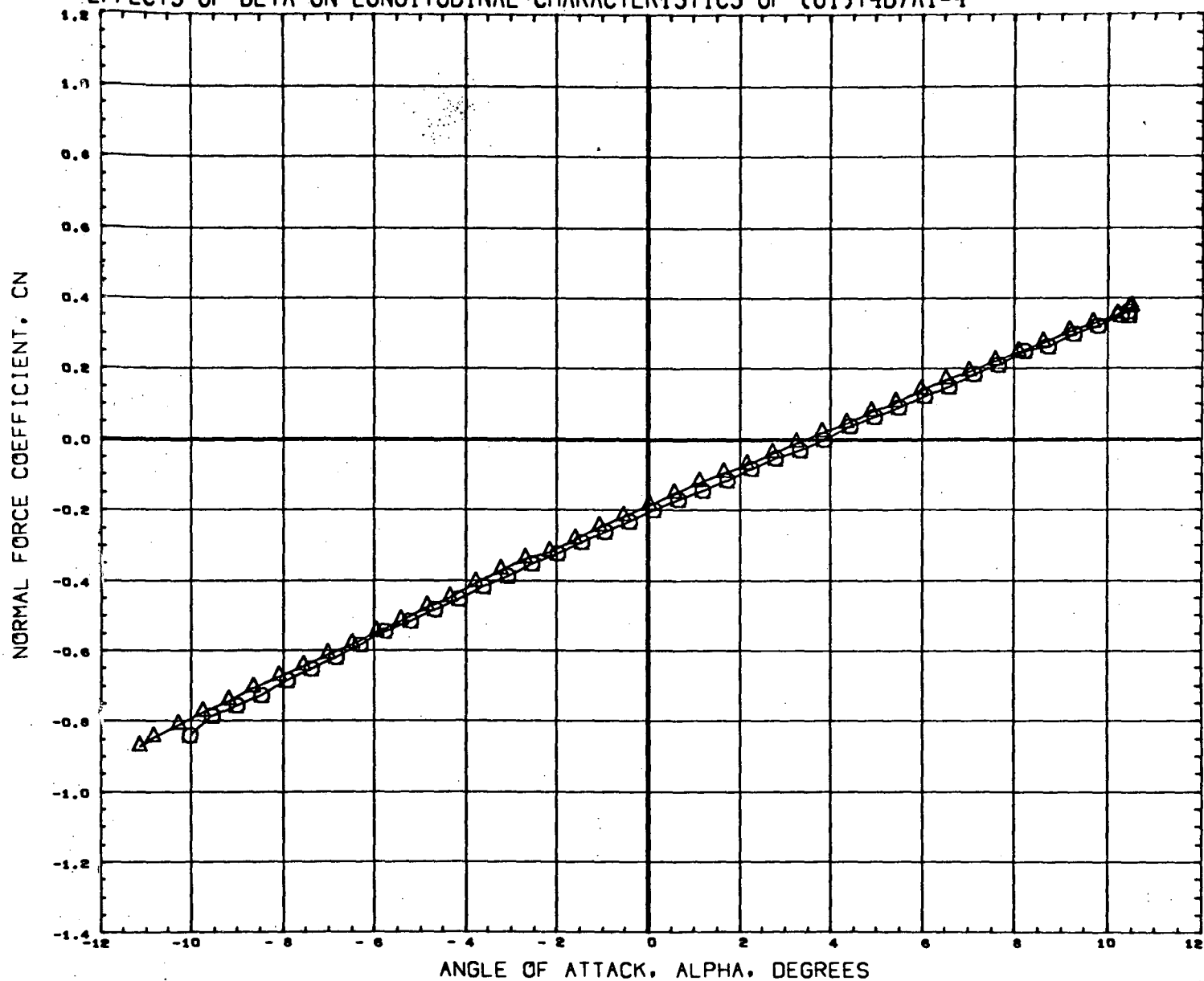


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| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 | IN. |
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| | | | | | | ZMRP | 200.0004 | IN. |
| | | | | | | SCALE | 0.0060 | SCALE |

MACH .90

PAGE 2

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4



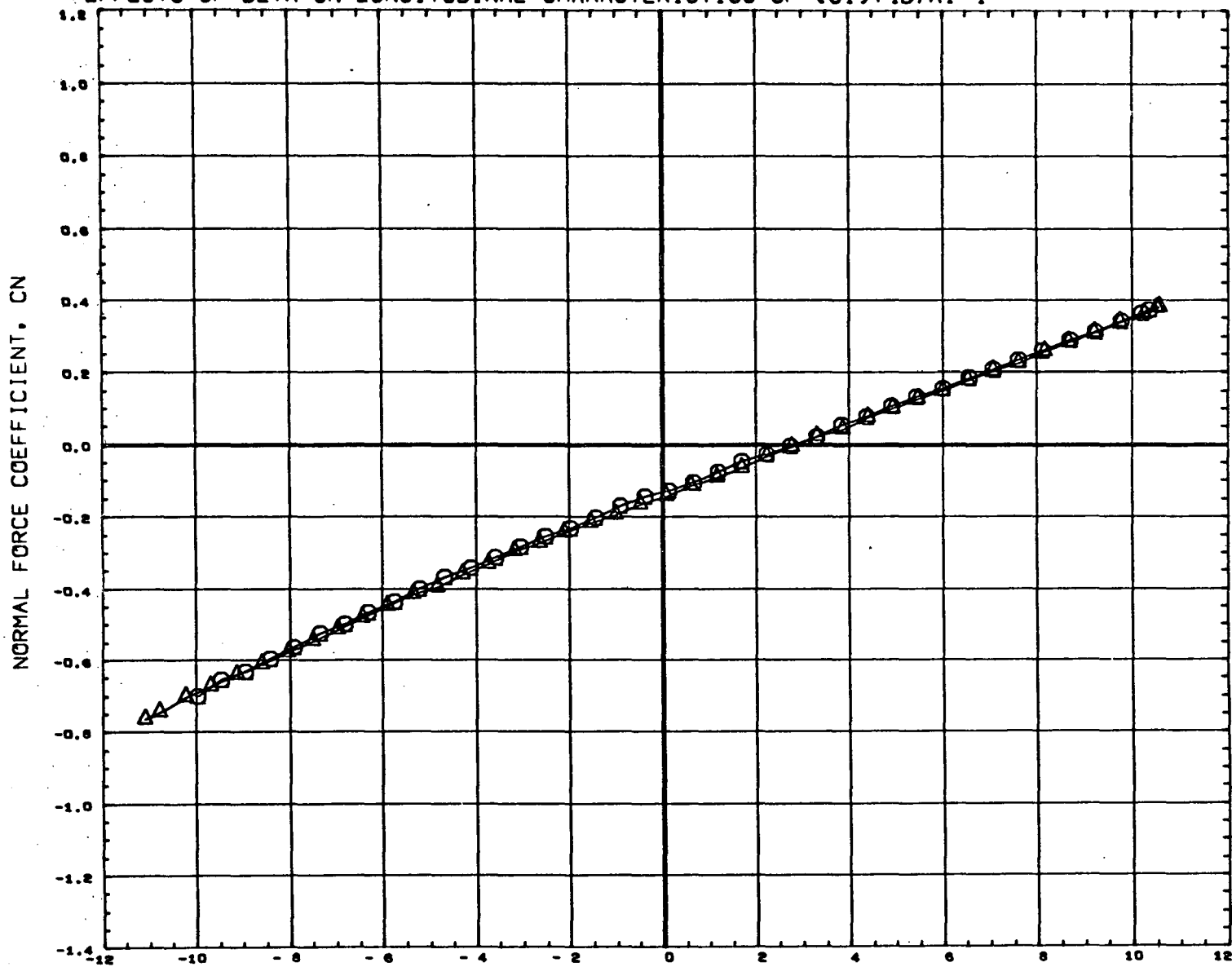
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|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
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MACH 1.08

PAGE 3

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4



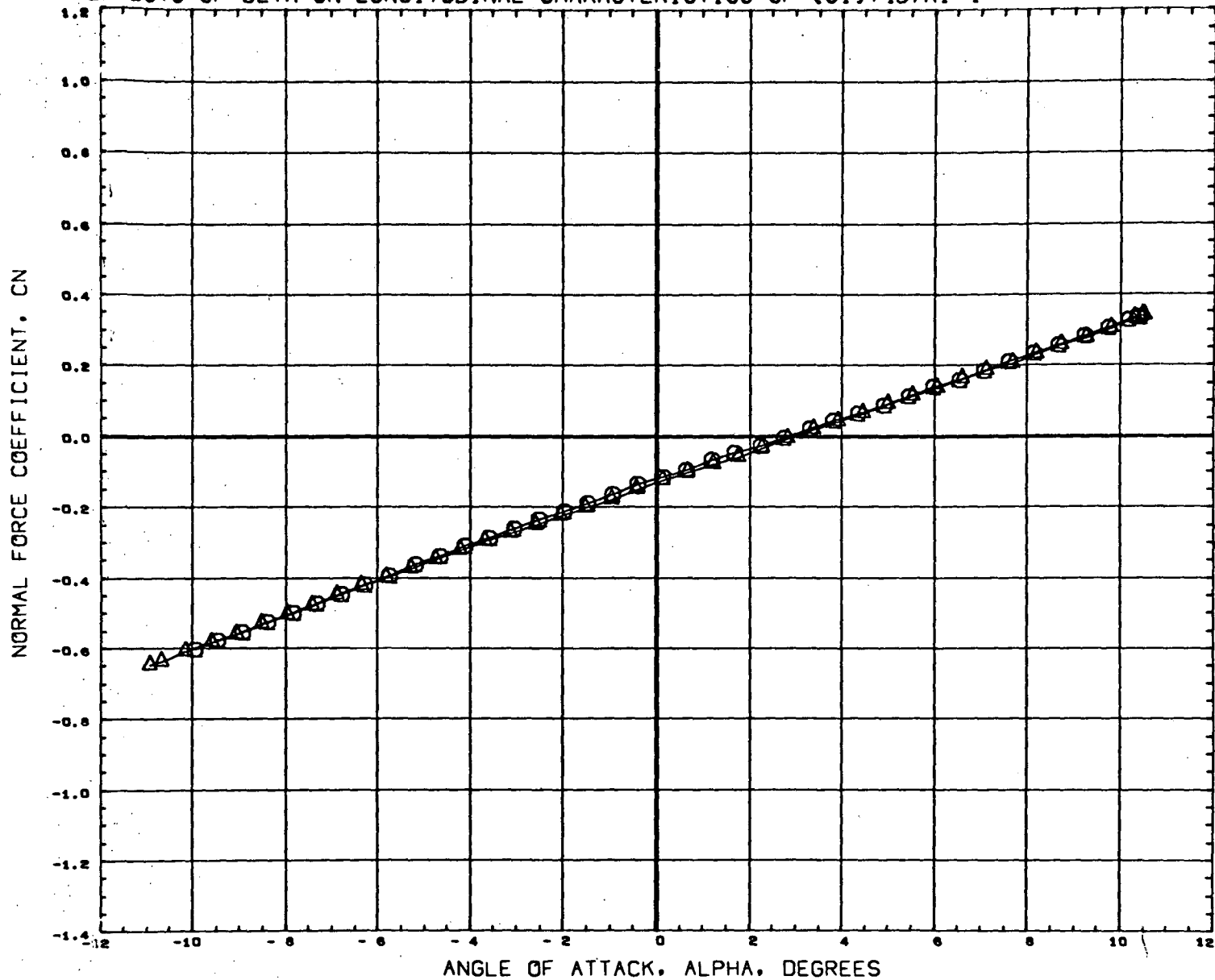
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| (CD74C9) | △ | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
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| | | | | ZMRP | 200.0004 IN. |
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MACH 1.51

PAGE 4

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4

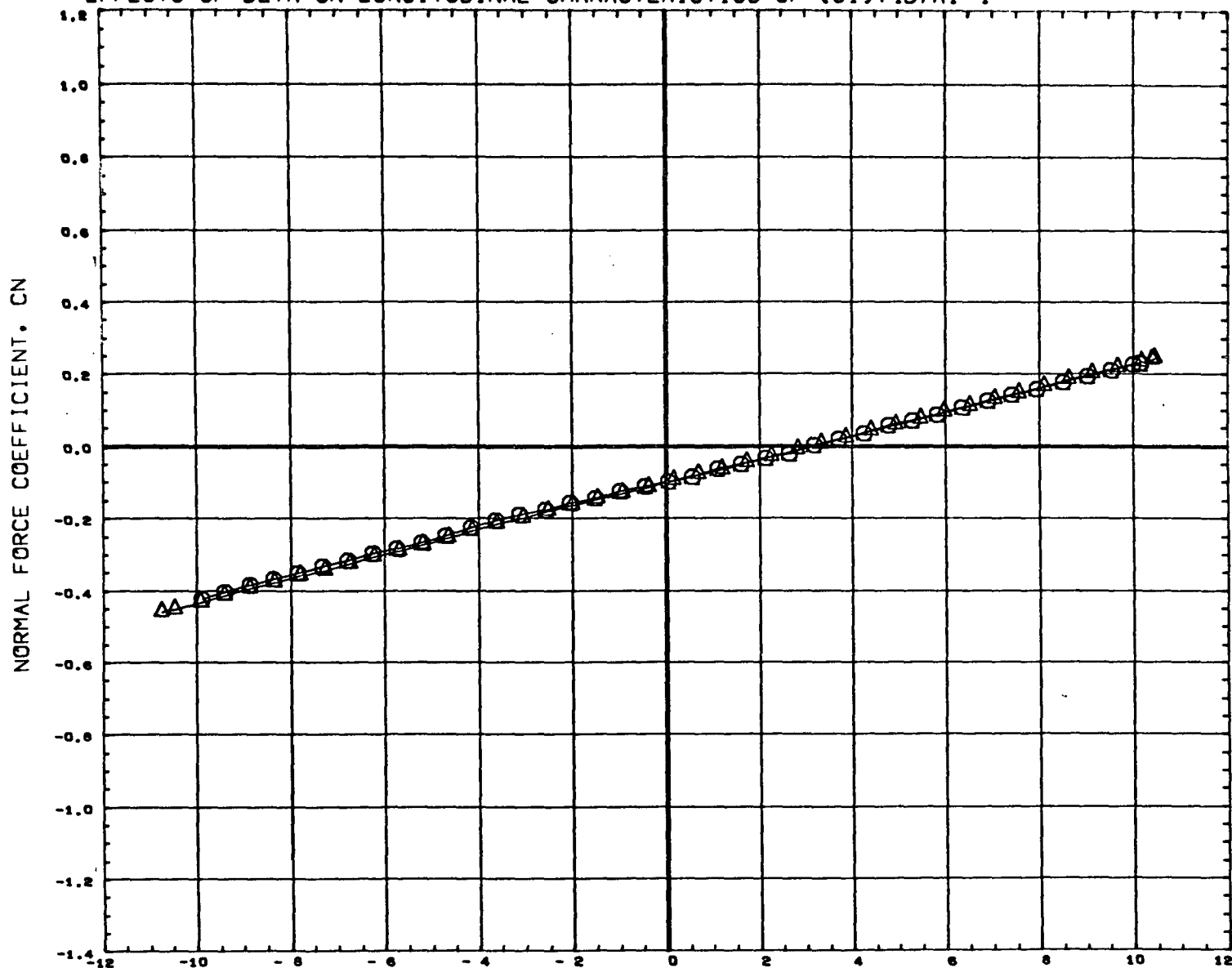


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| | | | | | | ZMRP | 200.0004 | IN. |
| | | | | | | SCALE | 0.0060 | SCALE |



MACH 2.20

PAGE 5

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4



DATA SET SYMBOL CONFIGURATION DESCRIPTION

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 (CD74C9)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

| BETA | ELEVTR | AILRON | RUDDER |
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| 6.000 | 0.000 | 0.000 | 0.000 |

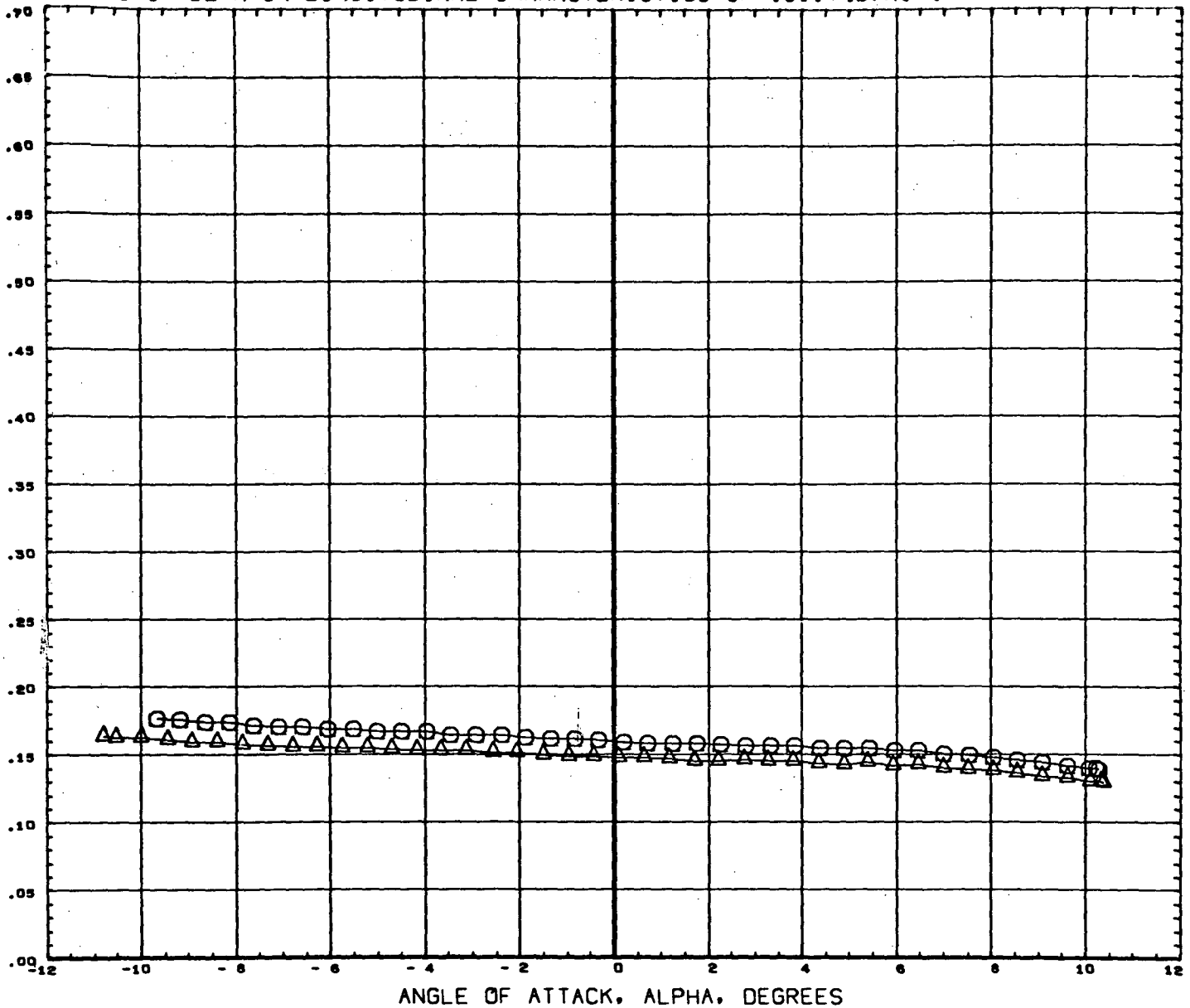
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
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| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 937.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 4.47

PAGE 6

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4

AXIAL FORCE COEFFICIENT, CA



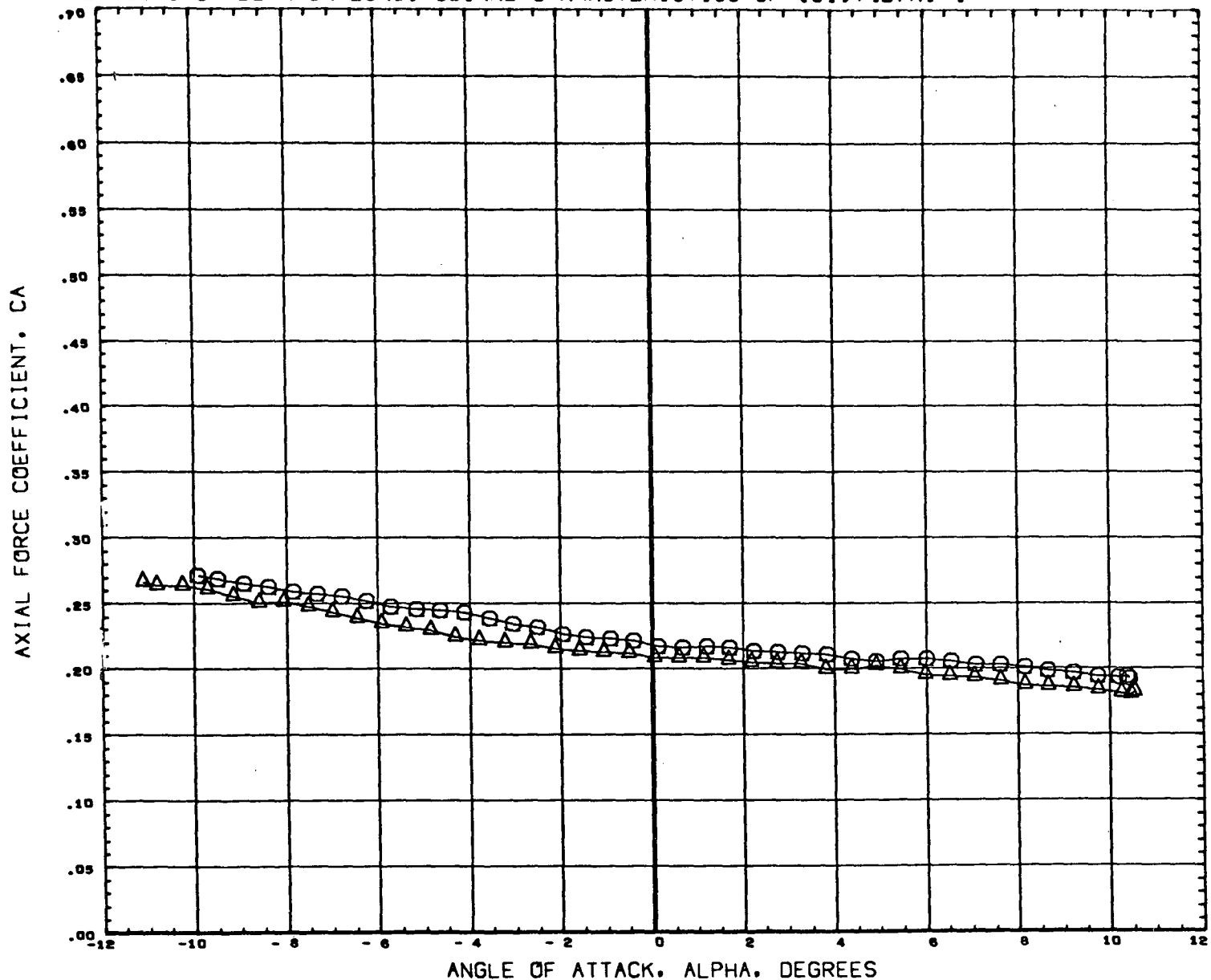
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 682.0004 IN. |
| | | | | YMRP | 557.0004 IN. |
| | | | | ZMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH .58

PAGE 7

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4



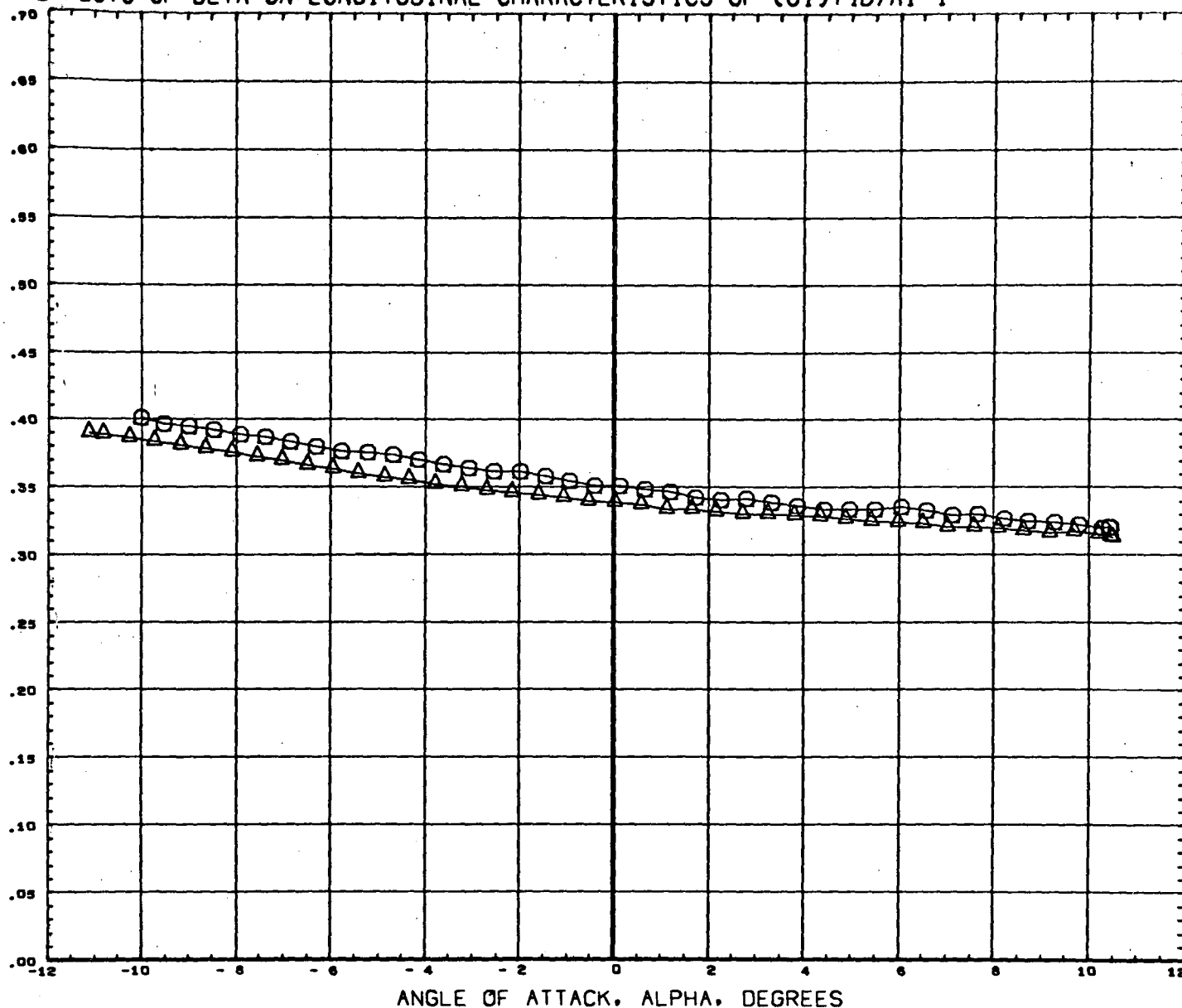
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 862.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

PAGE 8

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4

AXIAL FORCE COEFFICIENT, CA



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74C9) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

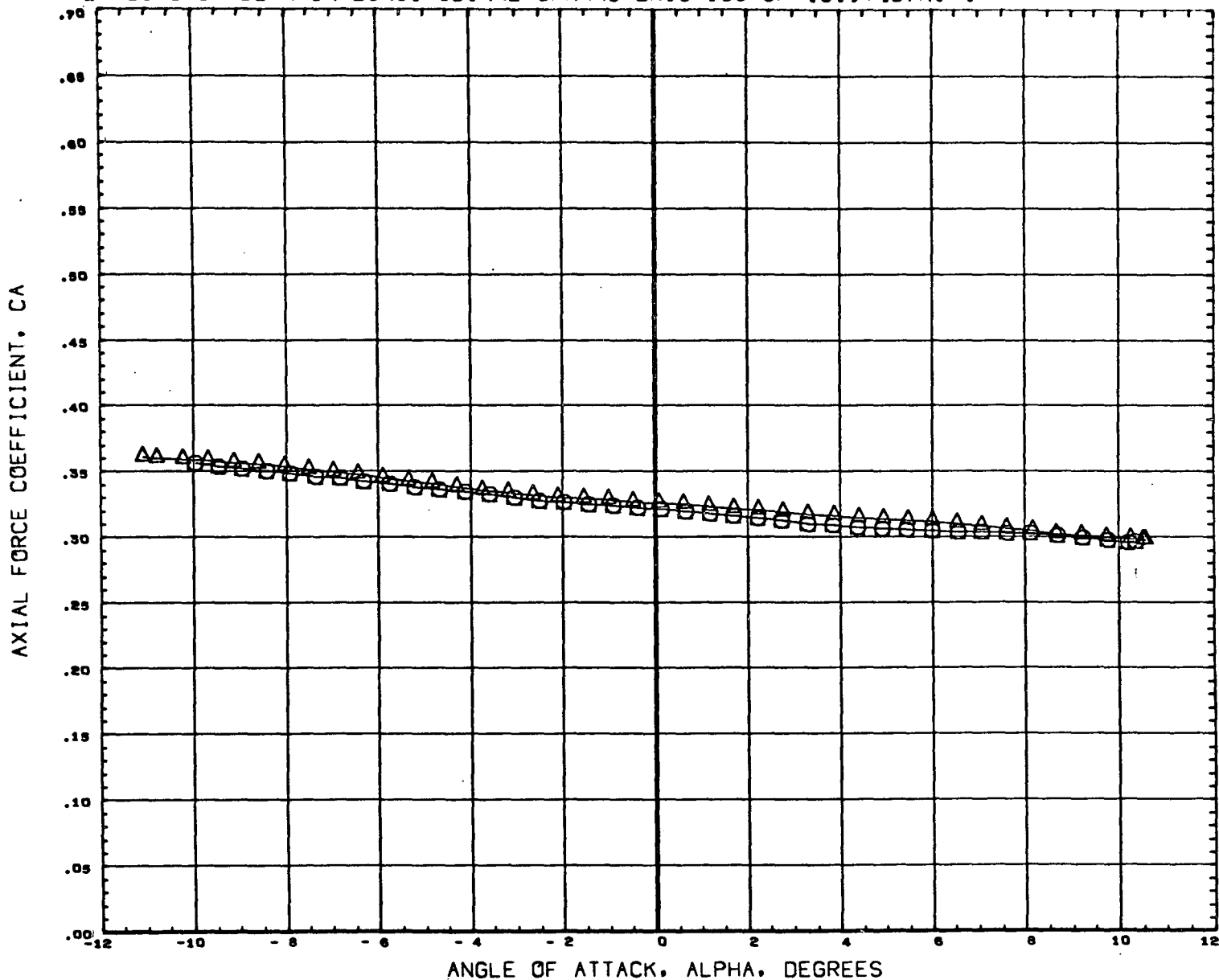
BETA ELEVTR AILRON RUDDER
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 6.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH 1.08

PAGE 9

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4



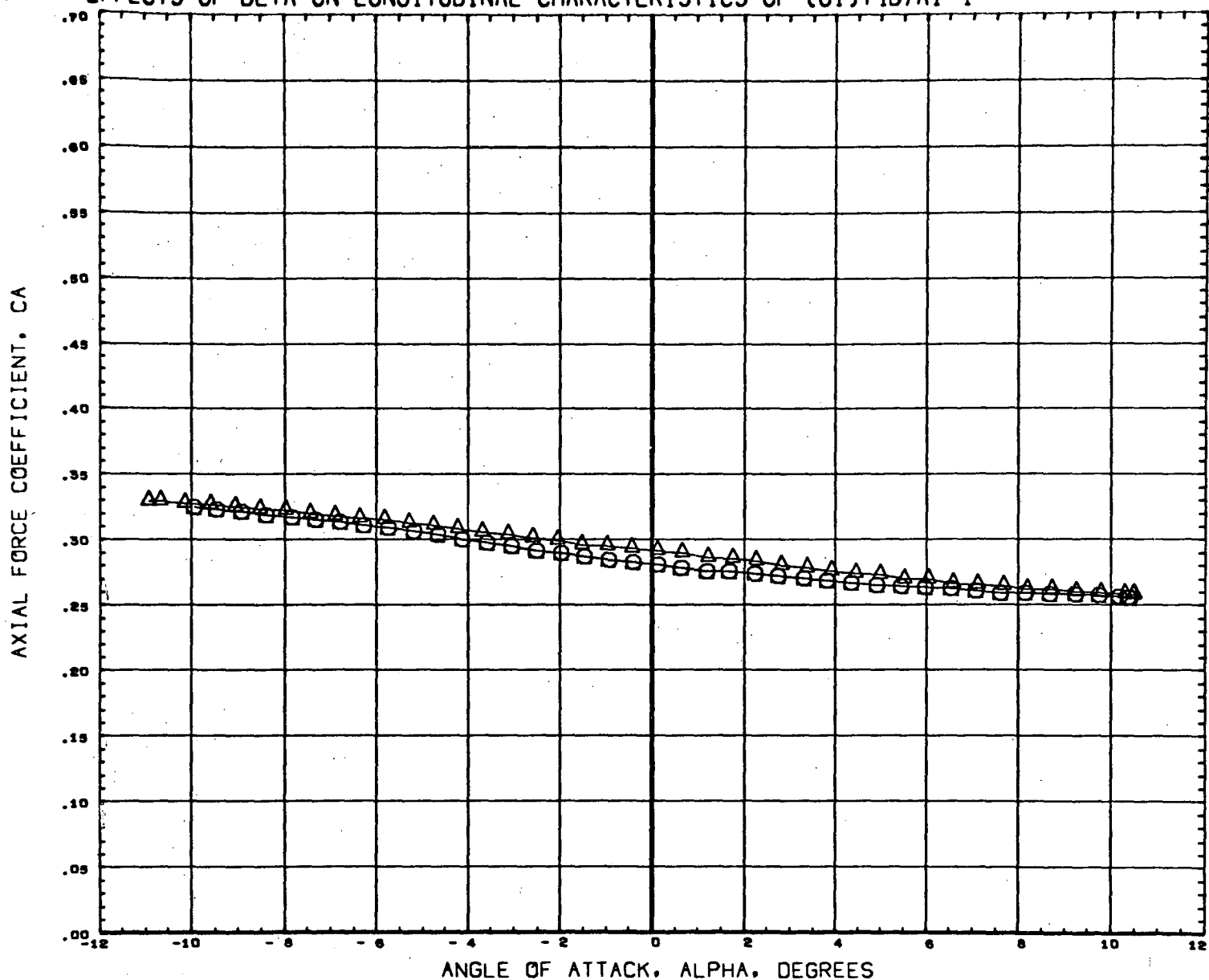
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH 1.51

PAGE 10

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4

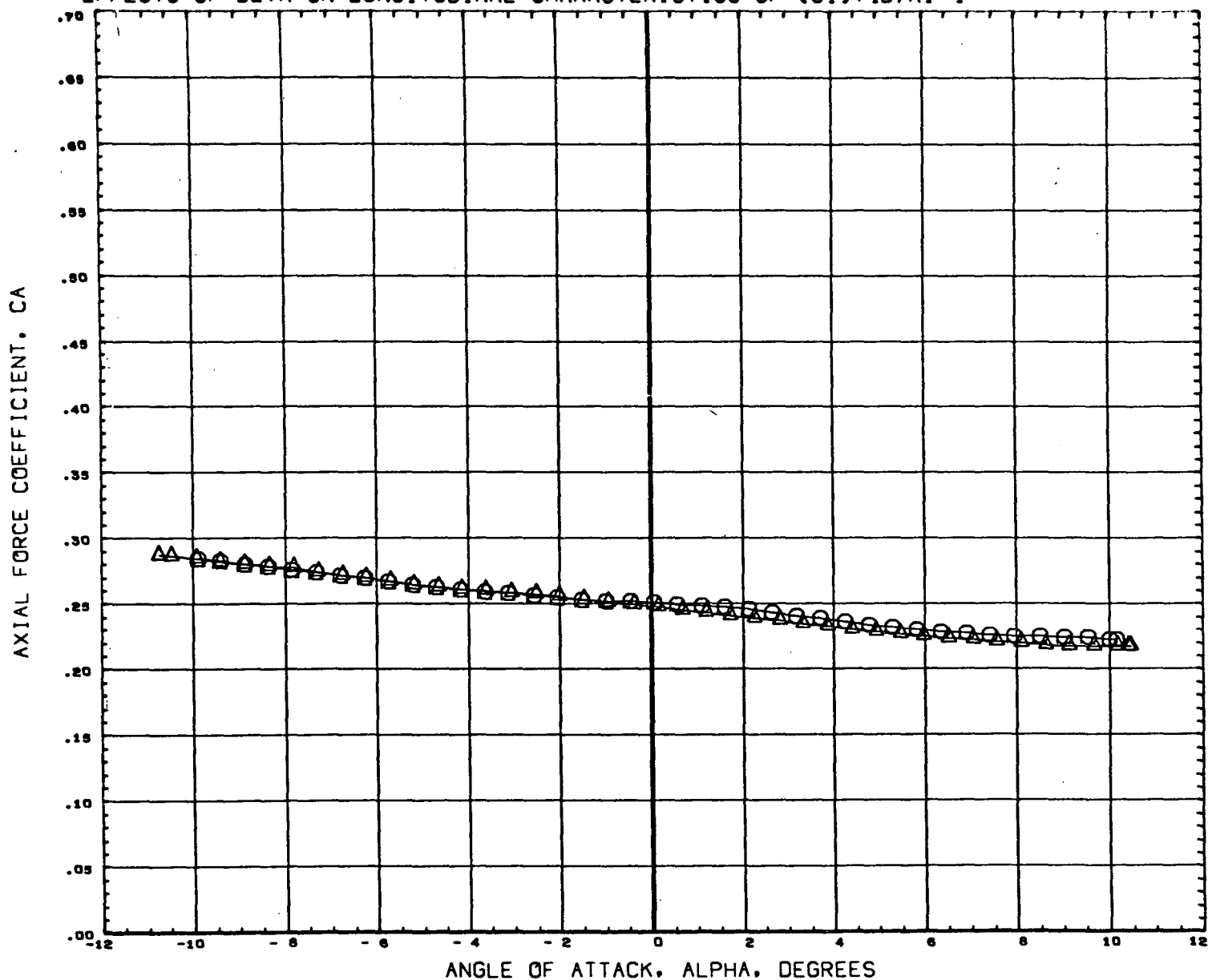


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 957.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

PAGE 11

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4



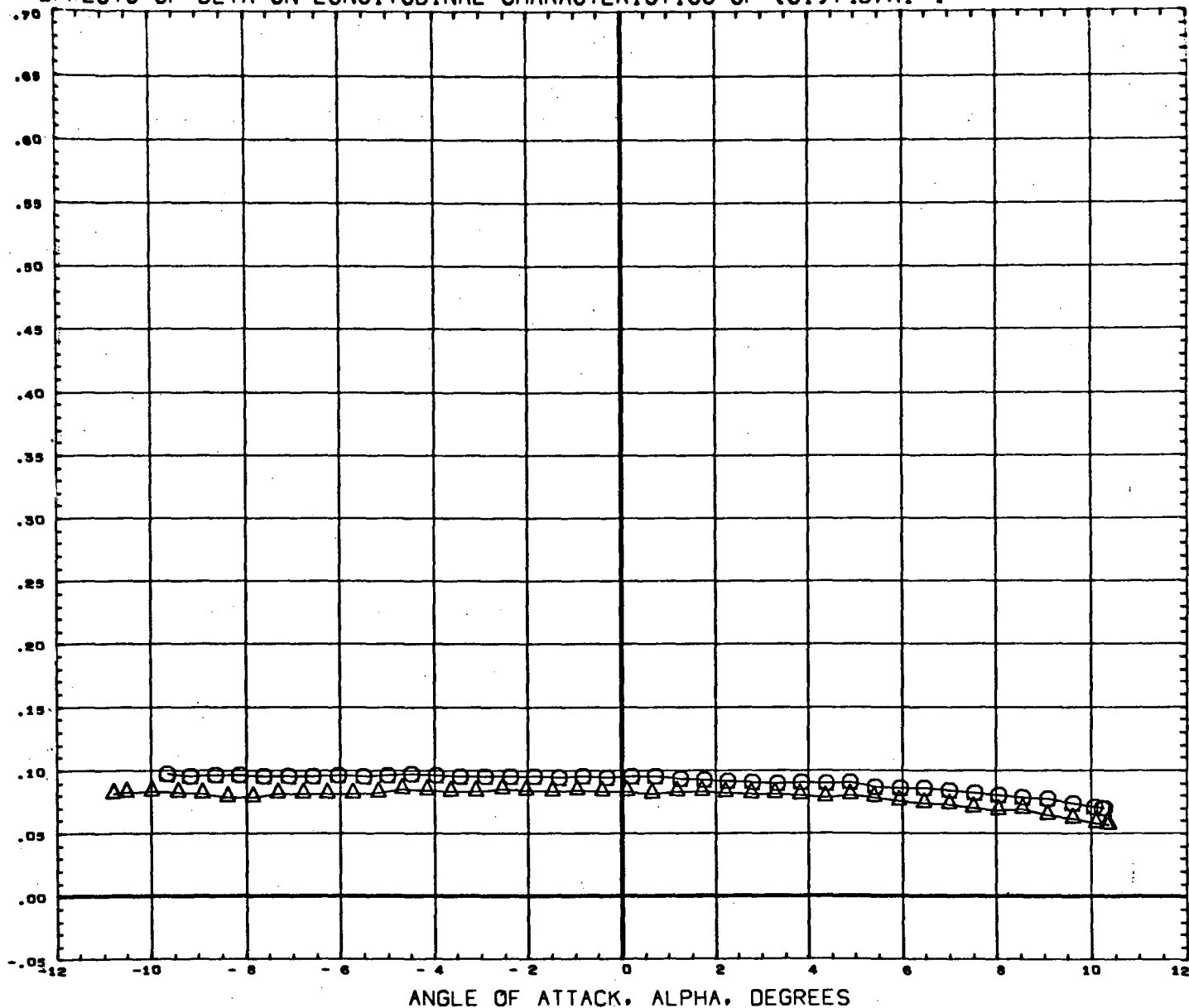
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (C074C7) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (C074C9) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | YMRP | 557.0004 IN. |
| | | | | | | ZMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4

FOREBODY AXIAL FORCE COEFFICIENT, CAF



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|--|--|
| (CD74C7)  | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (CD74C9)  | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |

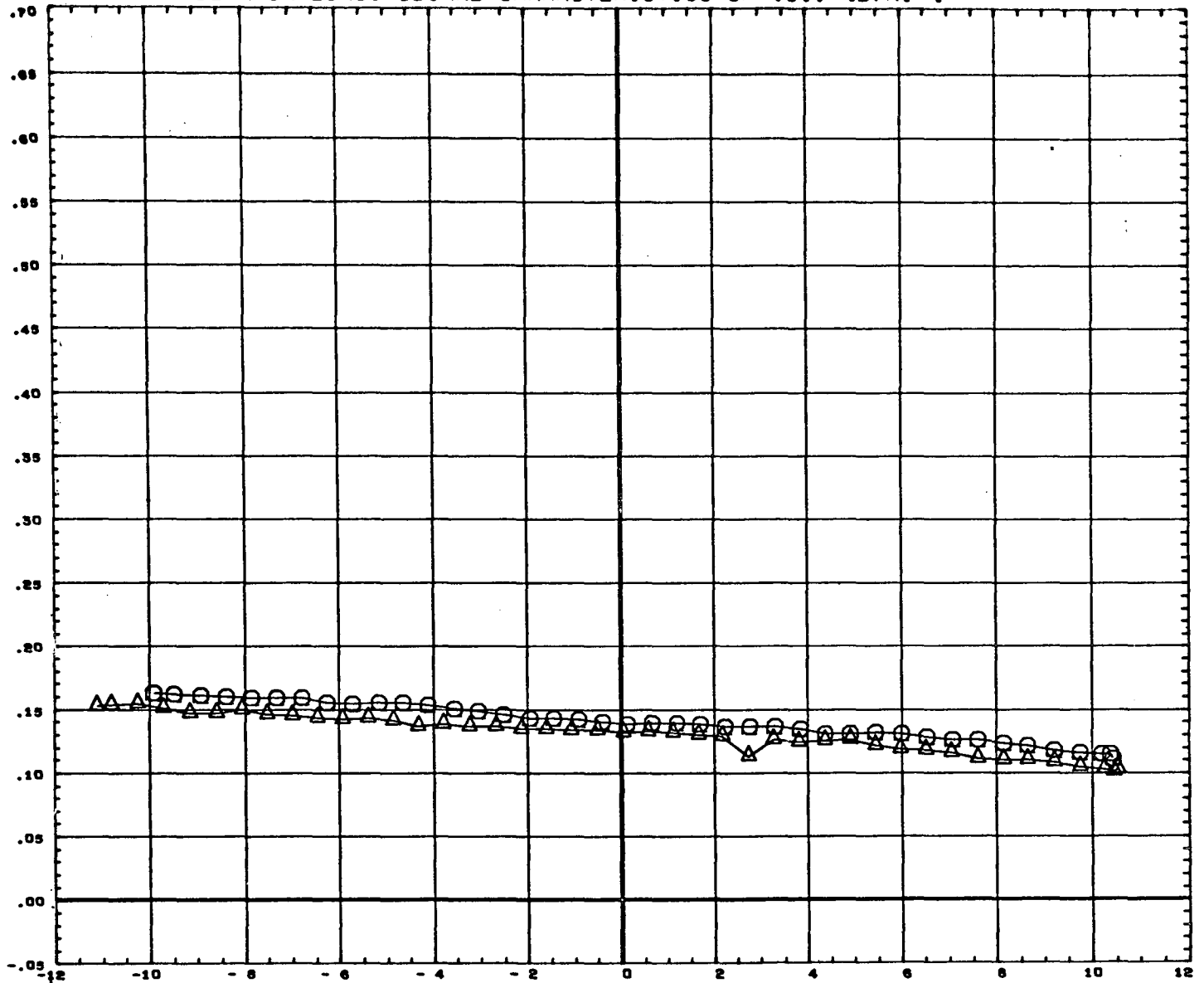
| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH .58

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4

FOREBODY AXIAL FORCE COEFFICIENT, CAF



ANGLE OF ATTACK, ALPHA, DEGREES

DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) (O) MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4
 (CD74C9) (Δ) MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4

BETA ELEVTR AILRON RUDDER
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 6.000 0.000 0.000 0.000

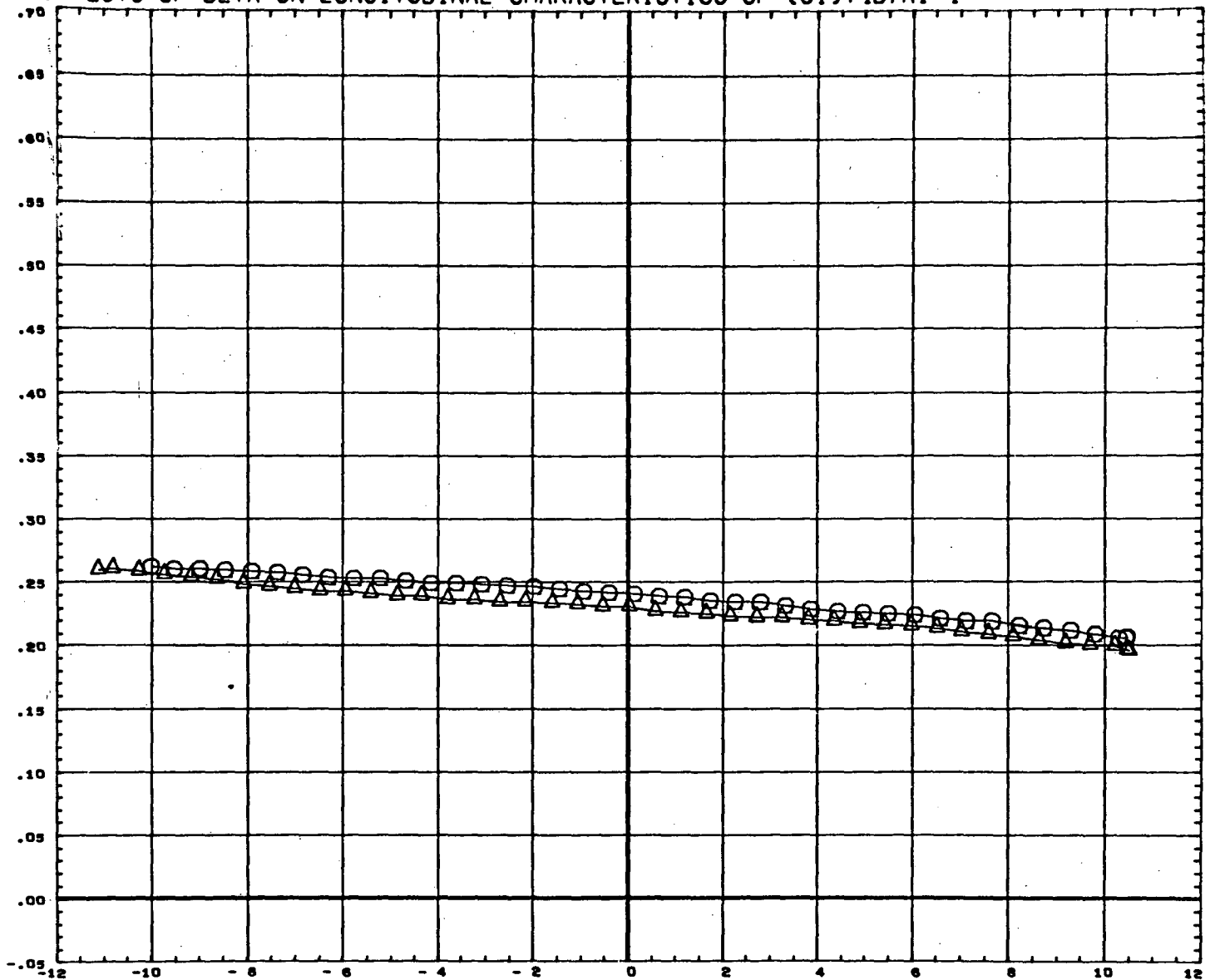
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 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH .90

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4

FOREBODY AXIAL FORCE COEFFICIENT, CAF



ANGLE OF ATTACK, ALPHA, DEGREES

DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
(CD74C9)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
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| 6.000 | 0.000 | 0.000 | 0.000 |

REFERENCE INFORMATION

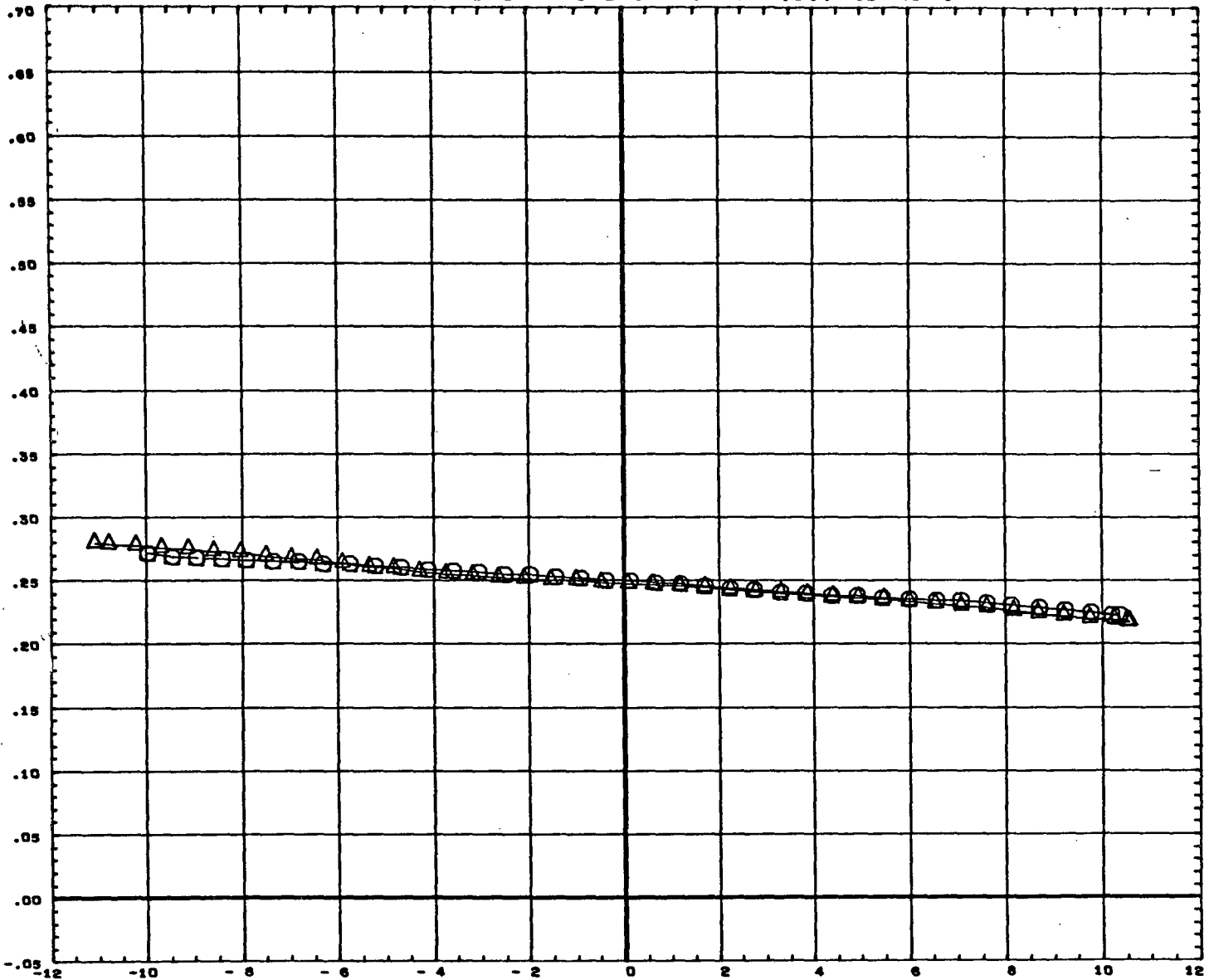
| | | |
|-------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 1.08

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4

FOREBODY AXIAL FORCE COEFFICIENT, CAF



ANGLE OF ATTACK, ALPHA, DEGREES

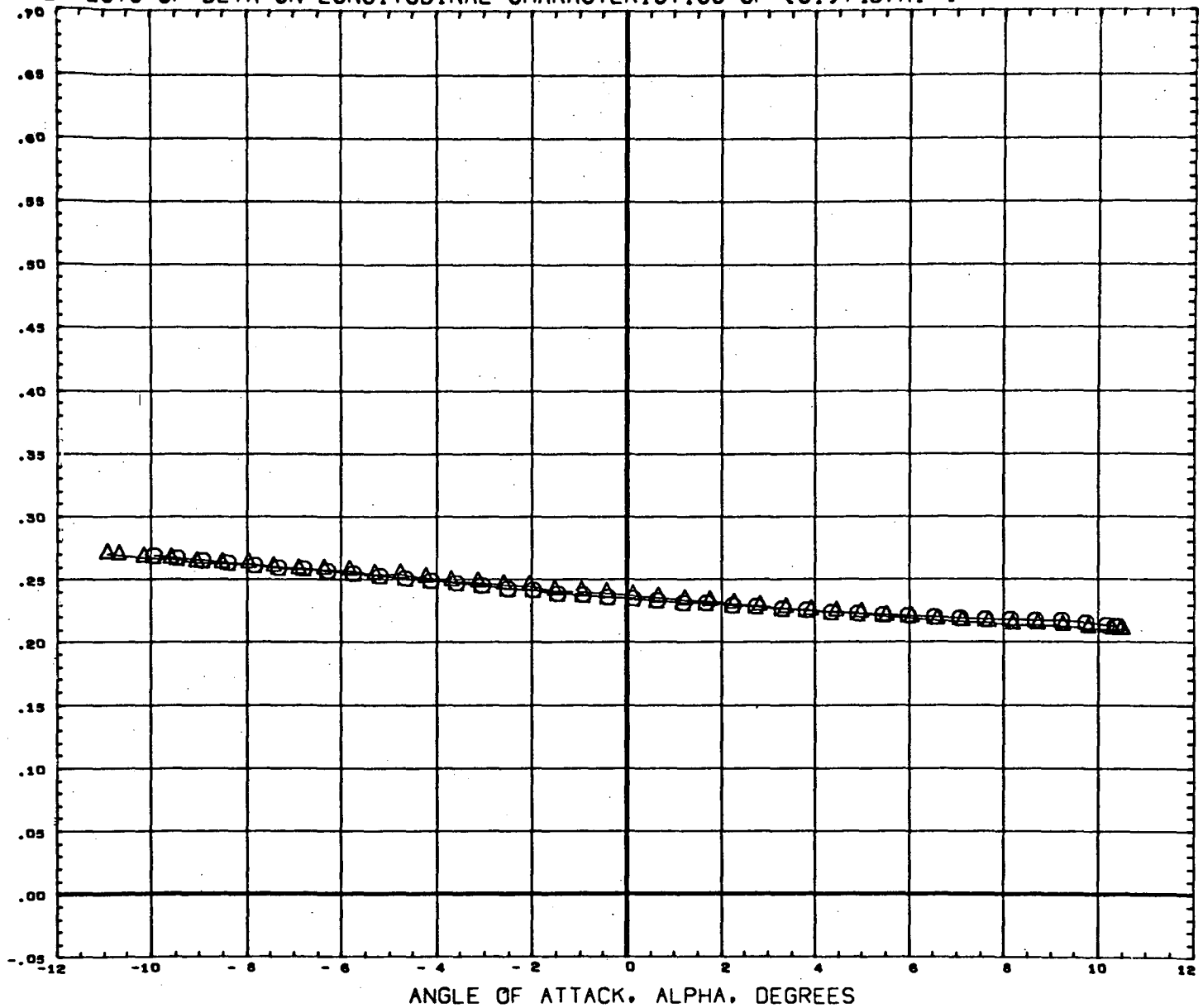
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-----------------|---|-------|--------|--------|--------|-----------------------|-----------|--------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | | | BREF | 882.0004 | IN. |
| | | | | | | XMRF | 557.0004 | IN. |
| | | | | | | YMRF | 0.0000 | IN. |
| | | | | | | ZMRF | 200.0004 | IN. |
| | | | | | | SCALE | 0.0060 | SCALE |

MACH 1.51

PAGE 16

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4

FOREBODY AXIAL FORCE COEFFICIENT, CAF

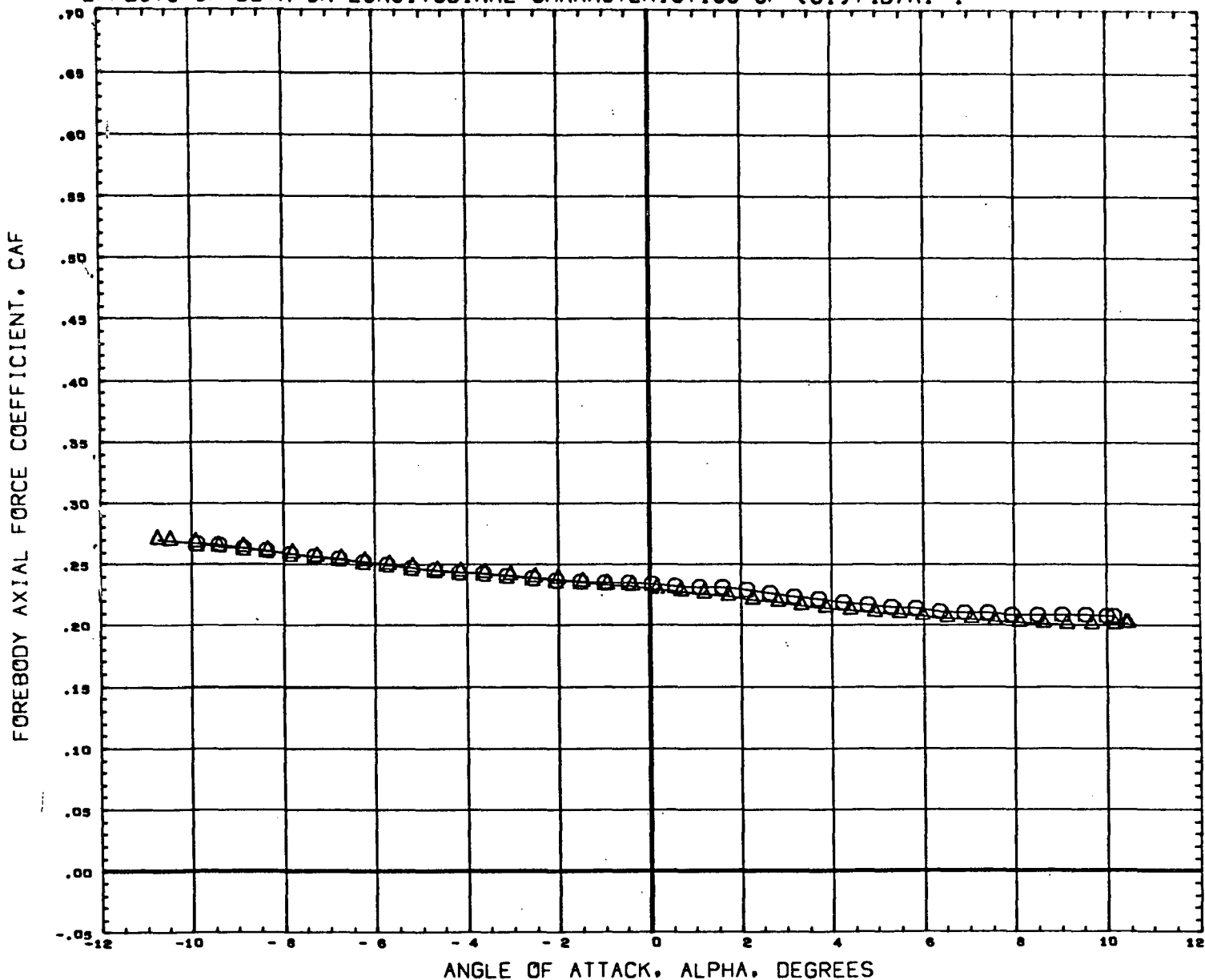


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

PAGE 17

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4

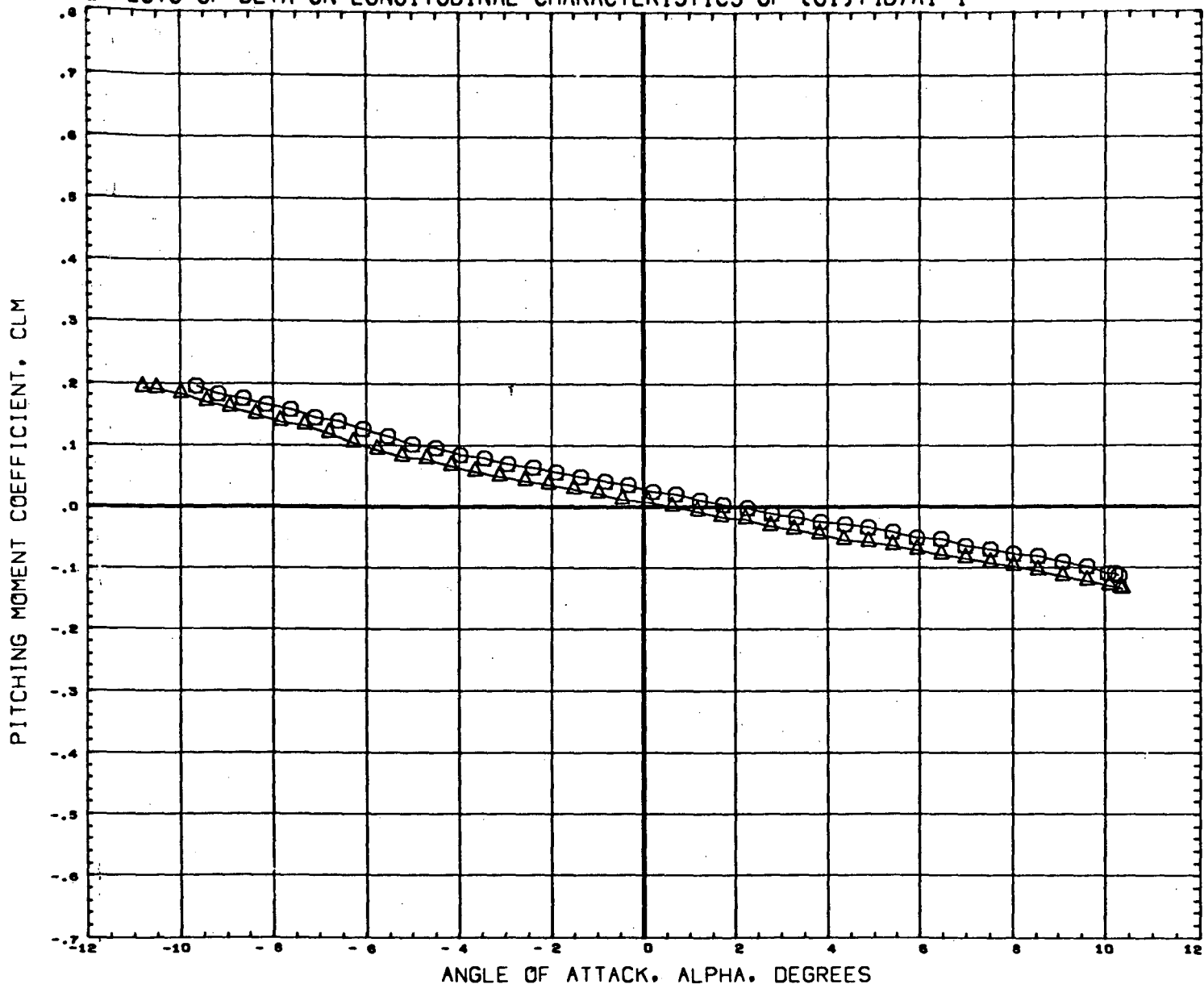


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 809.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

PAGE 18

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4

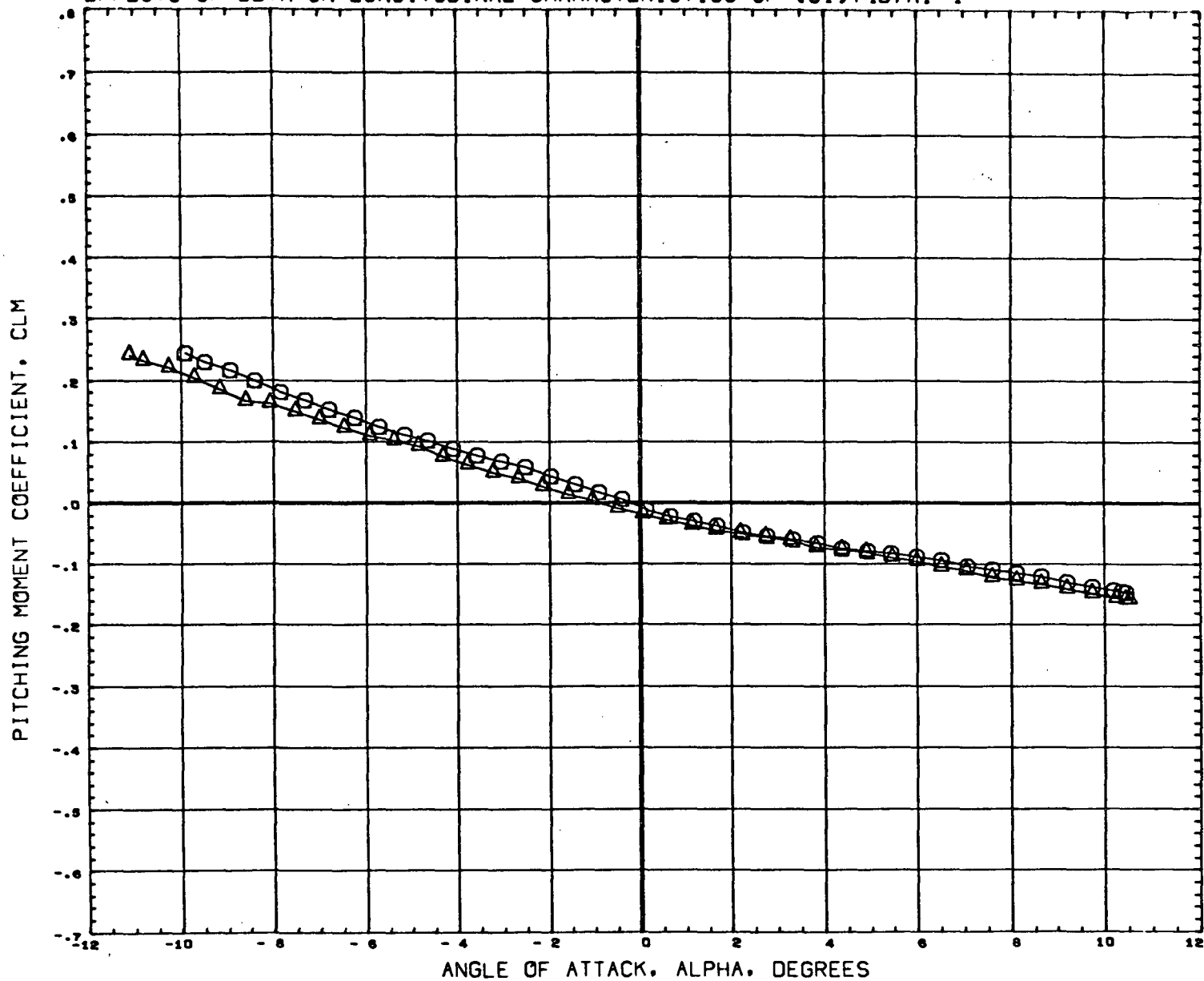


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE (T-C6) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74C9) | MDAC S-222 COMPOSITE (T-C6) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4



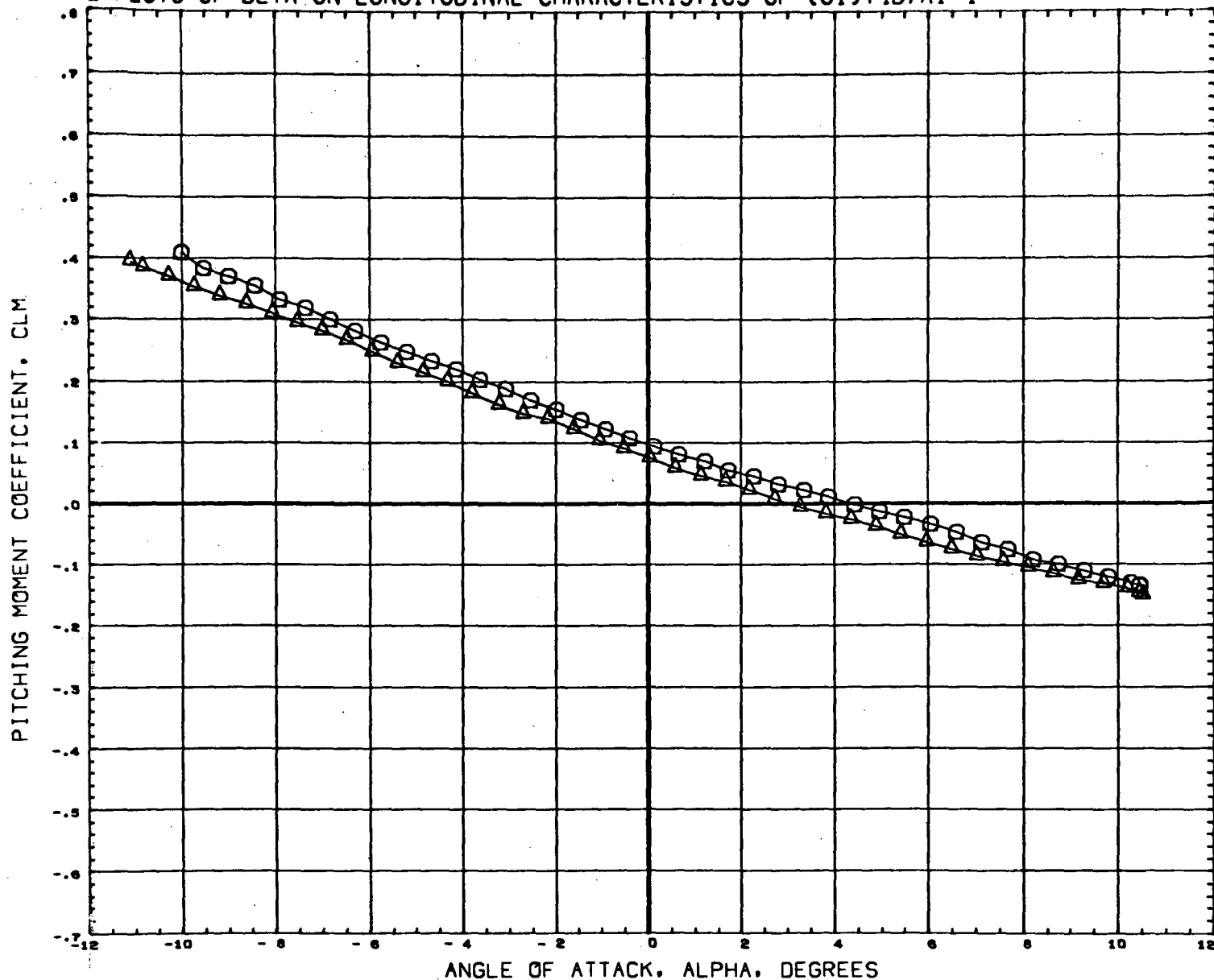
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
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| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH .90

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4

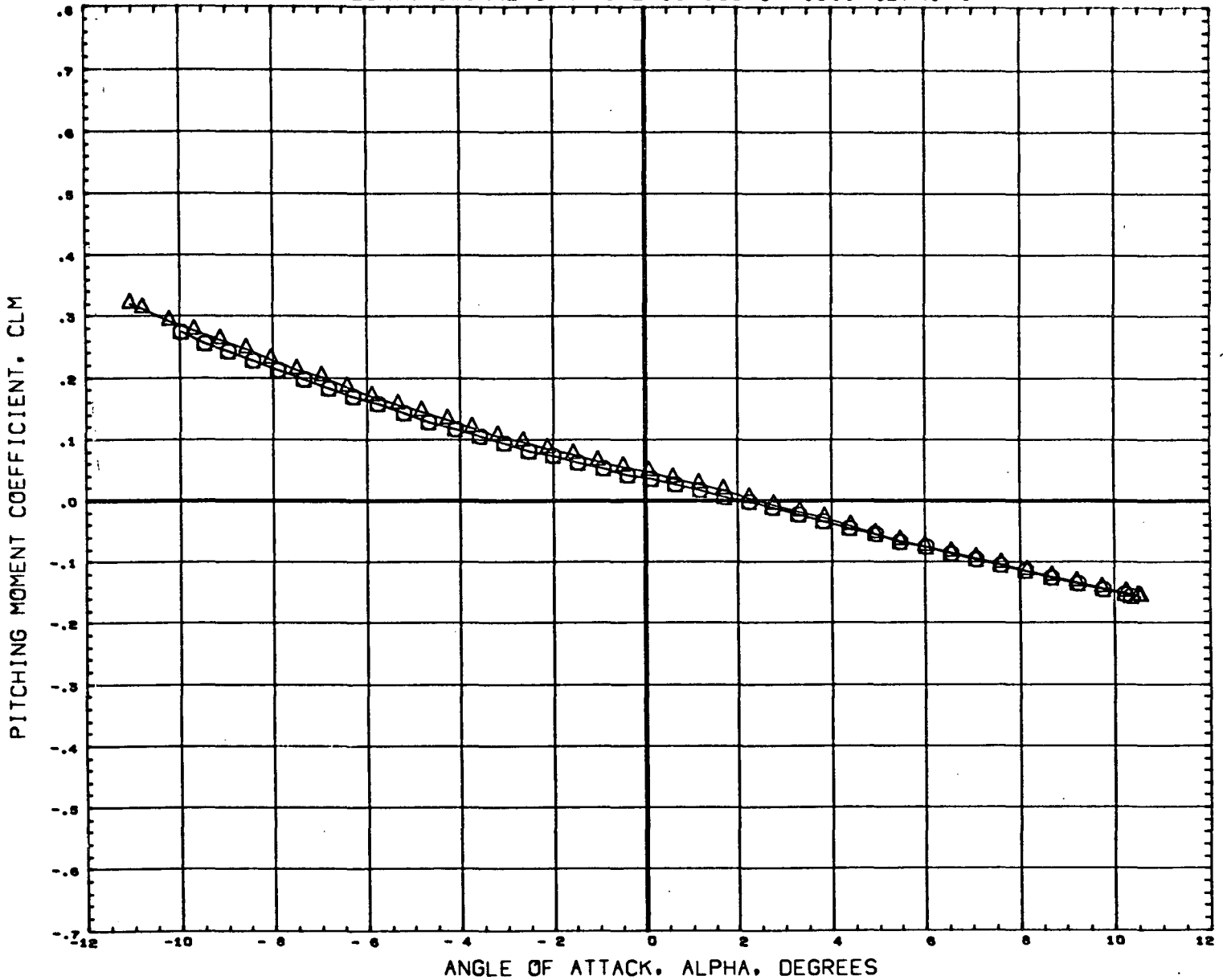


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 662.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD74C7) ○ | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 |
| (CD74C9) Δ | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 |

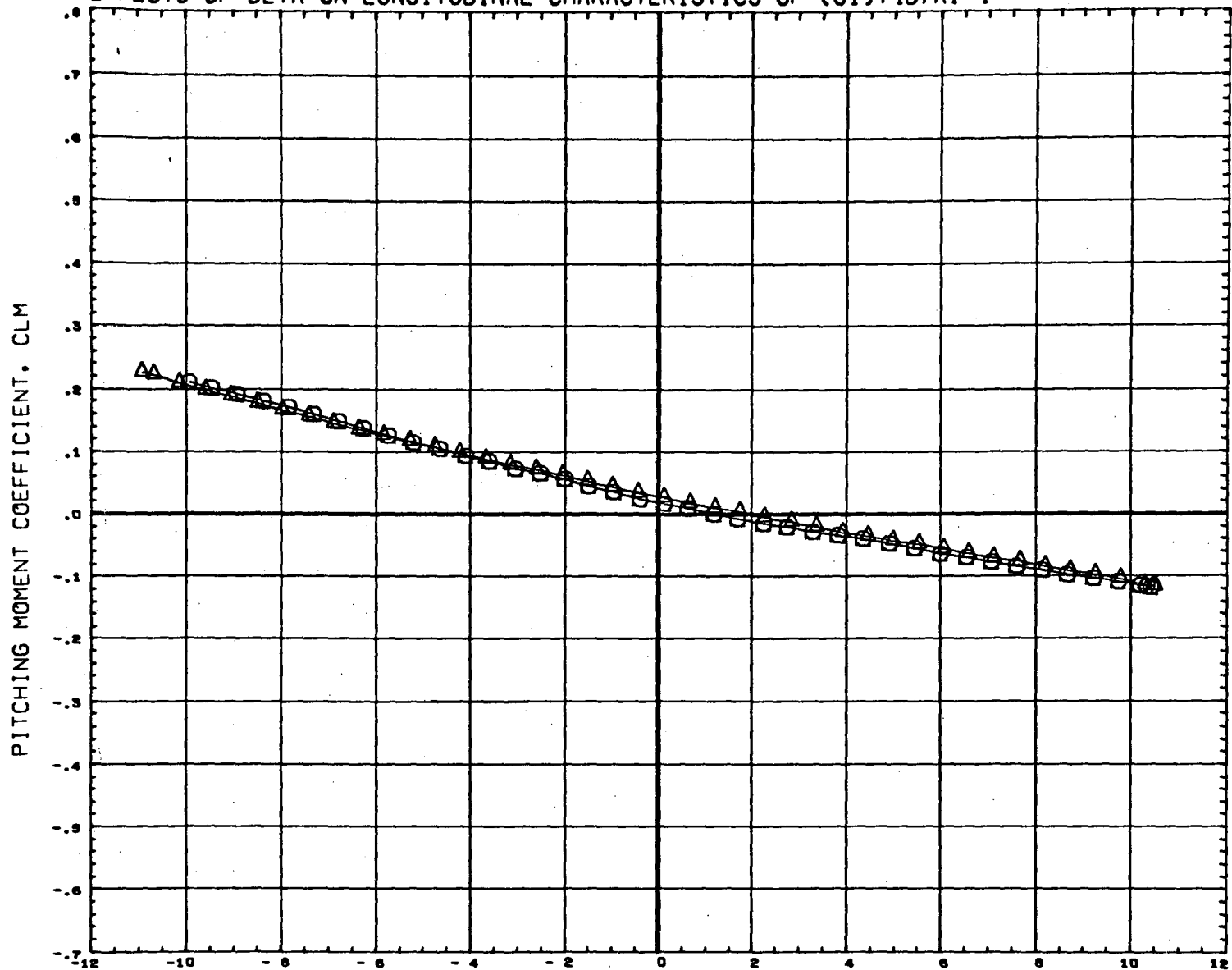
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMHP | 557.0004 | IN. |
| YMHP | 0.0000 | IN. |
| ZMHP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 1.51

PAGE 22

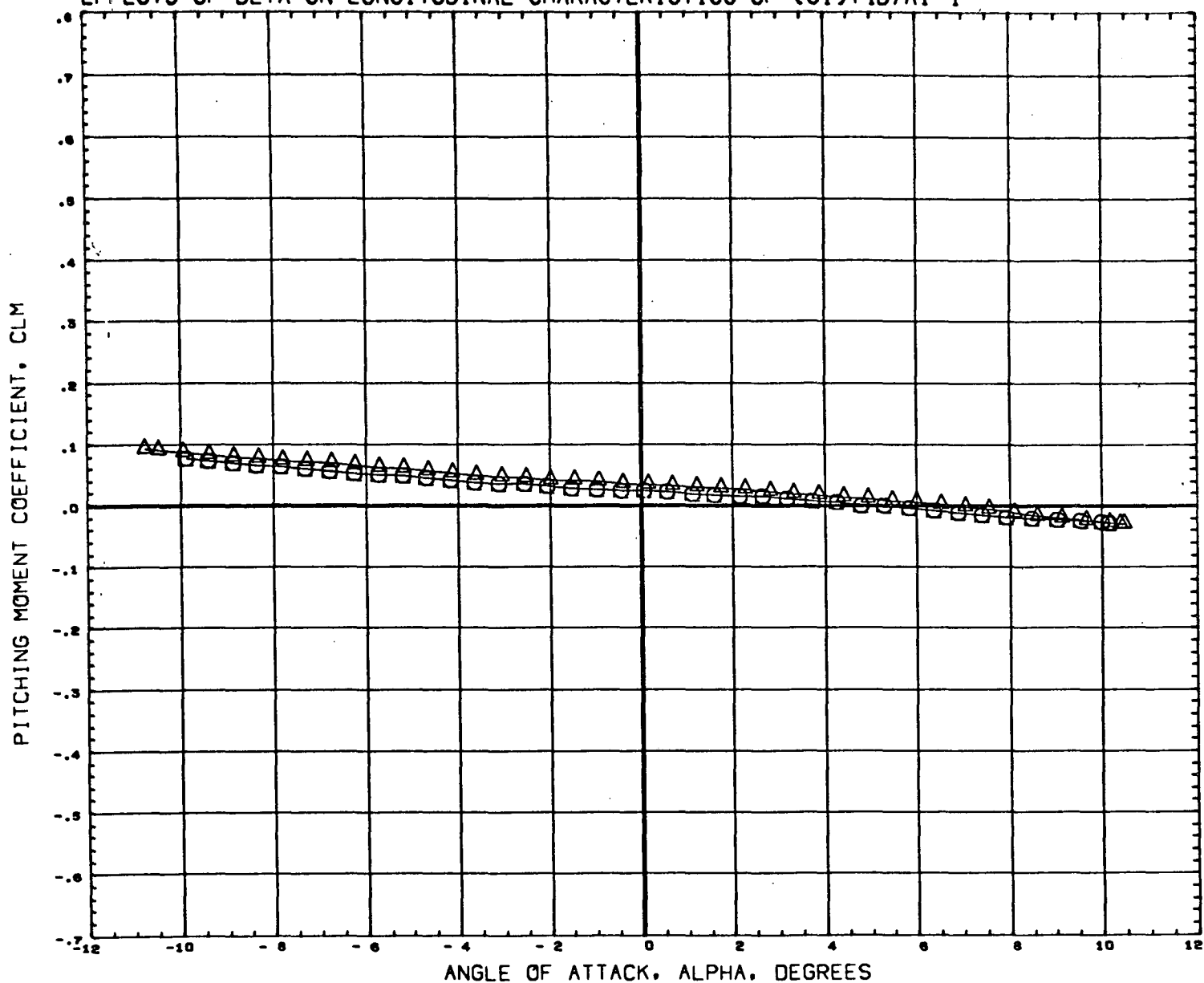
EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4



| DATA SET SYMBOL | | CONFIGURATION DESCRIPTION | | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|----------------------------|--------------|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | ○ | MDAC S-222 COMPOSITE(T-CG) | (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74C9) | △ | MDAC S-222 COMPOSITE(T-CG) | (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | | | BREF | 882.0004 IN. |
| | | | | | | | | XMRP | 557.0004 IN. |
| | | | | | | | | YMRP | 0.0000 IN. |
| | | | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4



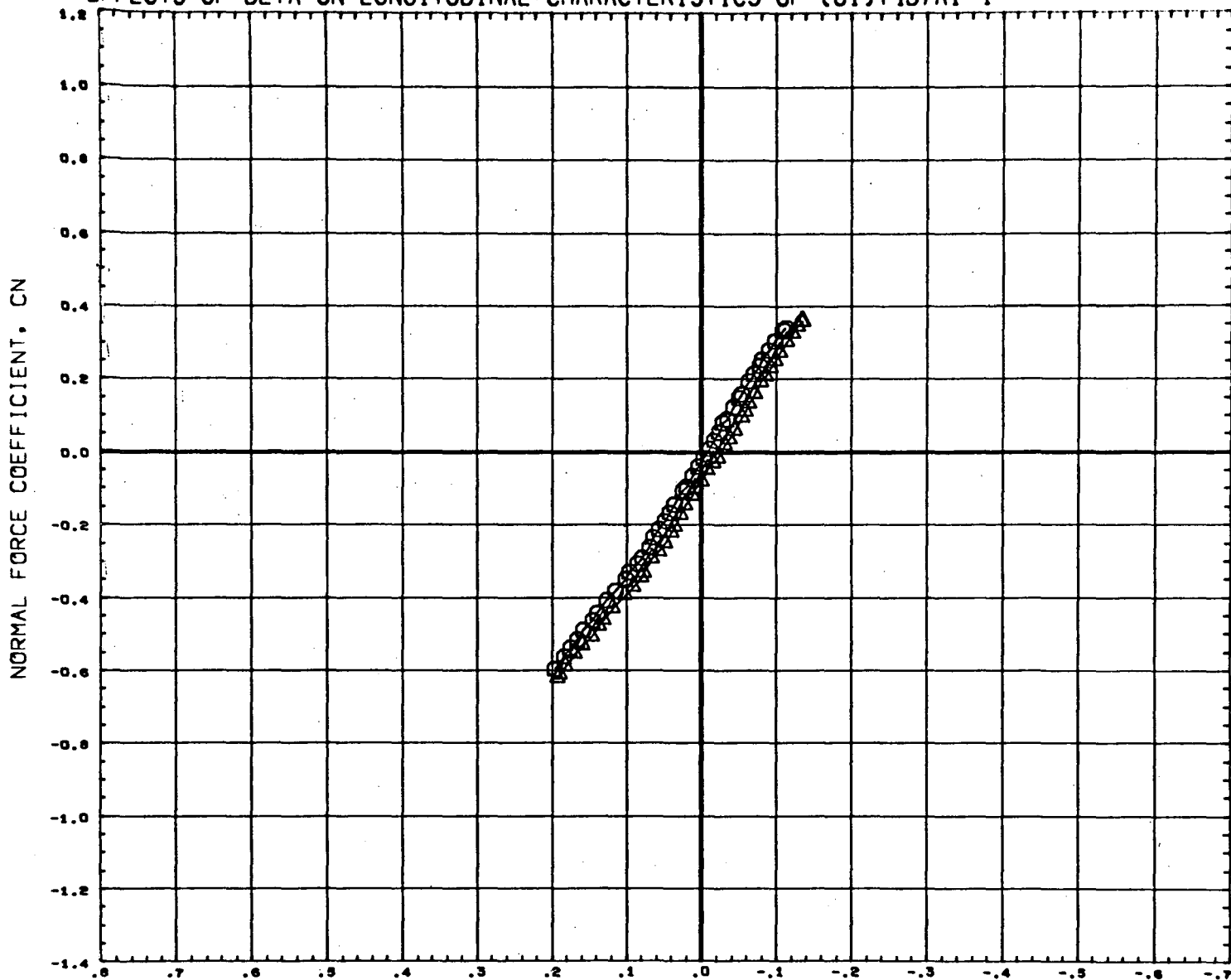
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 (CD74C9) △ MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 4.47

PAGE 24

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T487A1-4



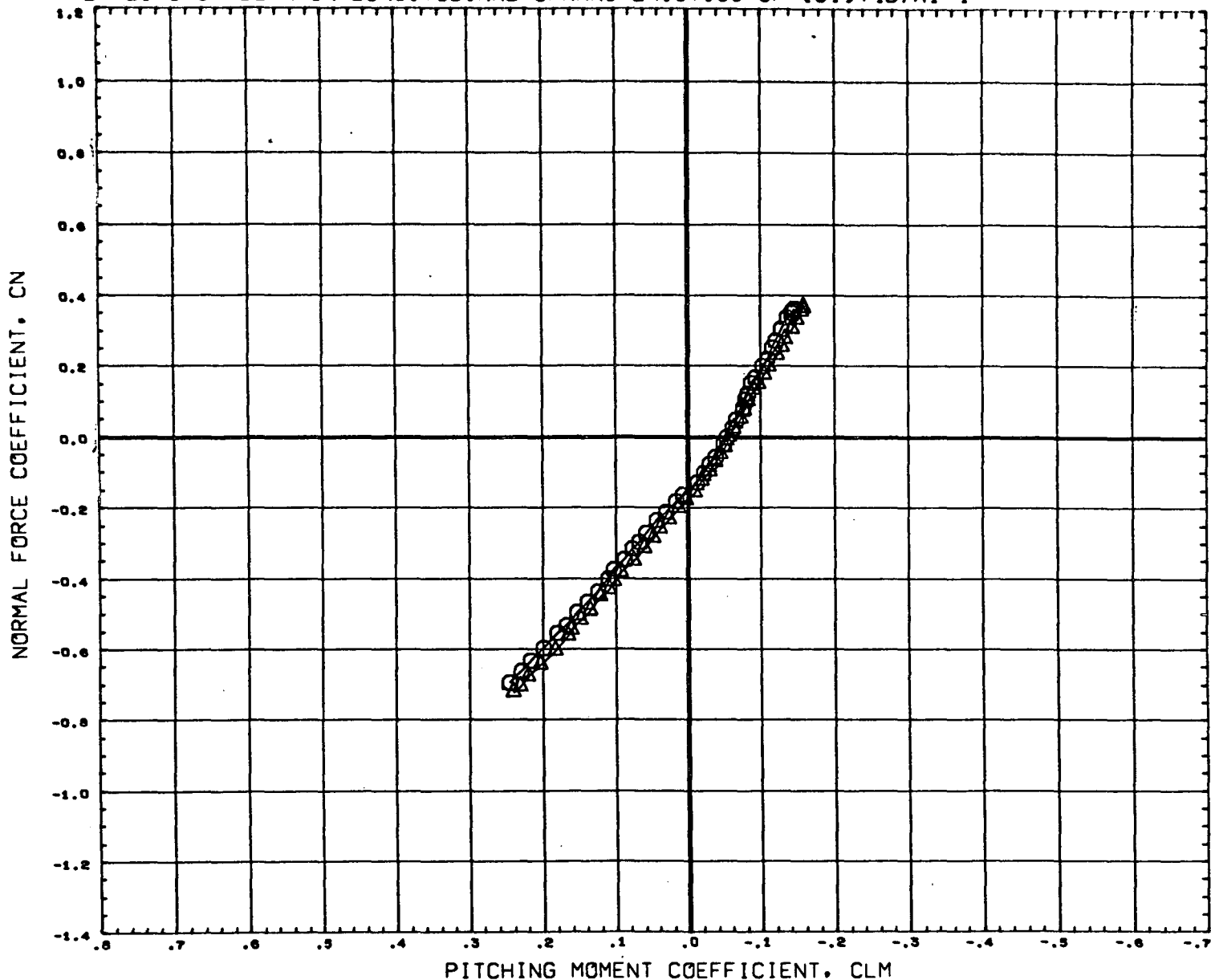
PITCHING MOMENT COEFFICIENT, CLM

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T487A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T487A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 937.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) \bigcirc MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4
 (CD74C9) \triangle MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4

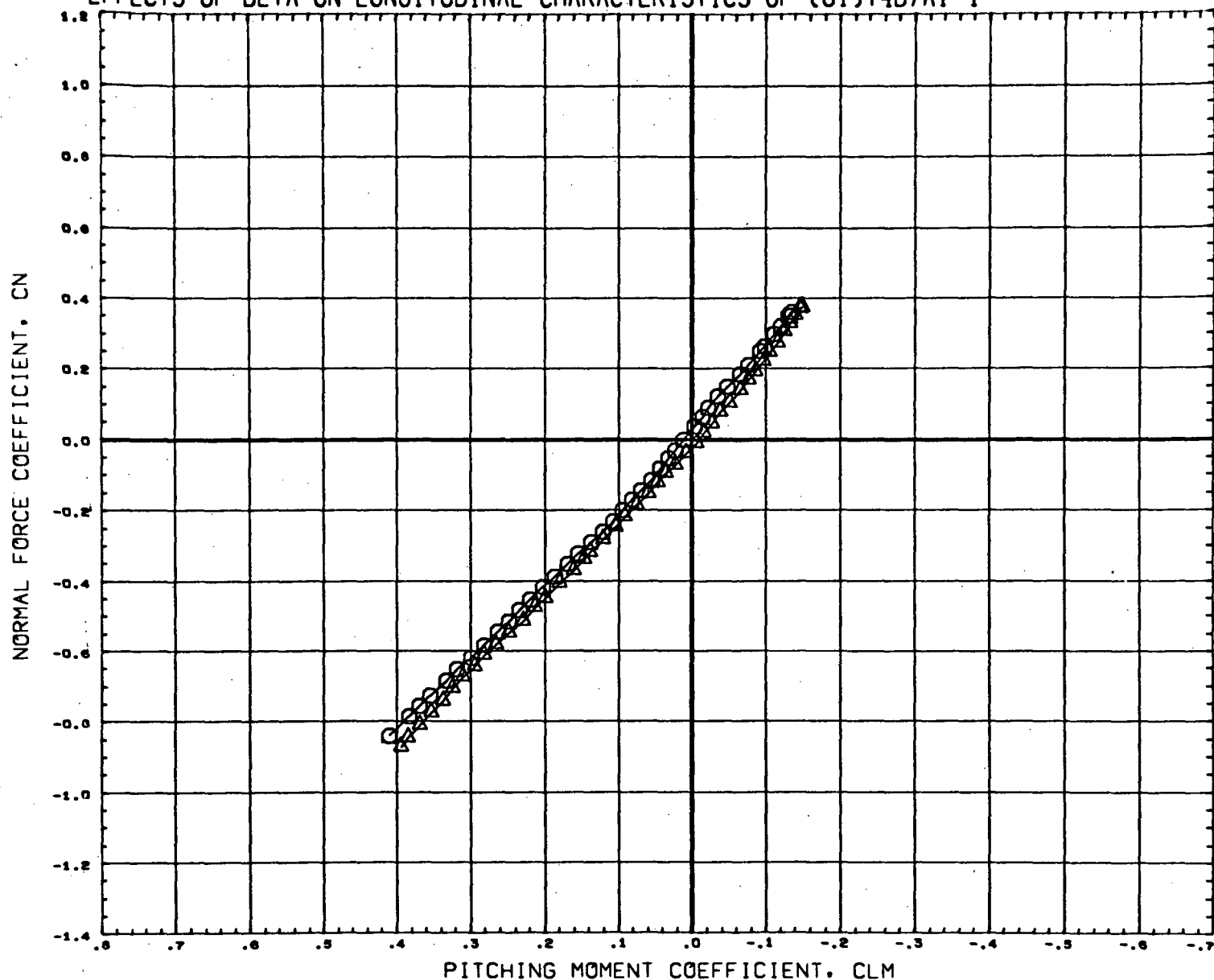
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 682.0004 | IN. |
| XMRP | 937.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH .90

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4

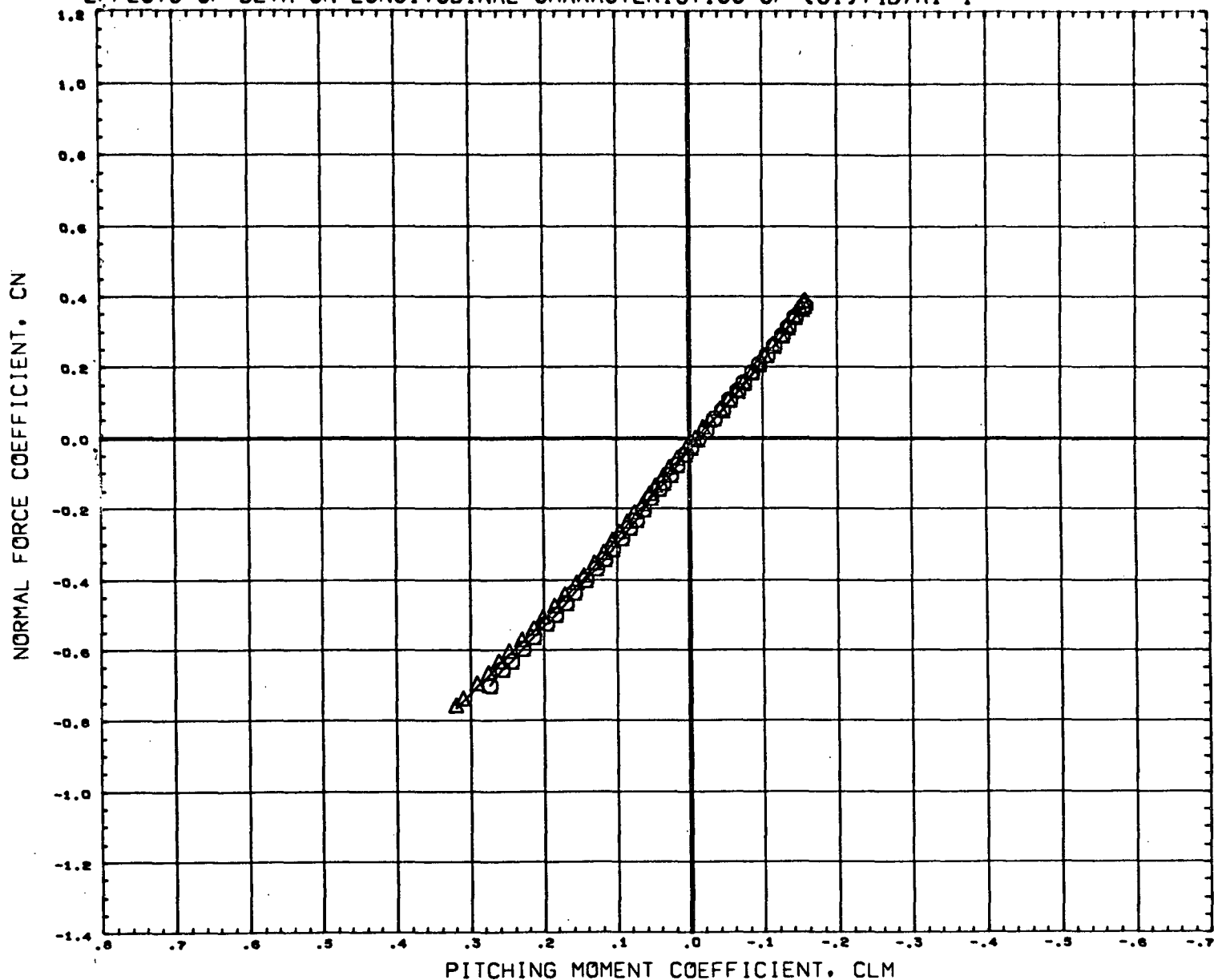


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 662.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) Q MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4
 (CD74C9) Δ MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4

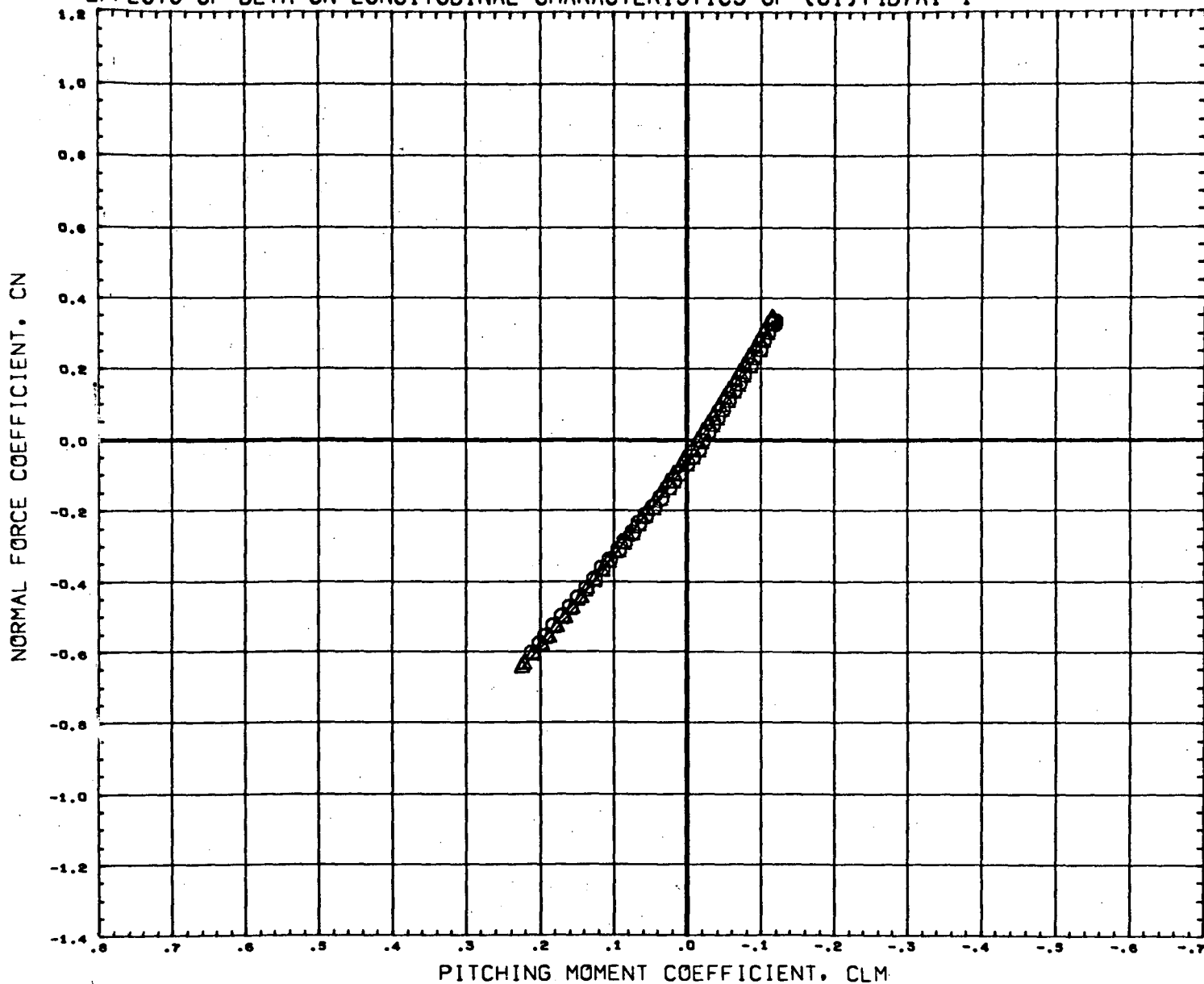
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 1.51

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4

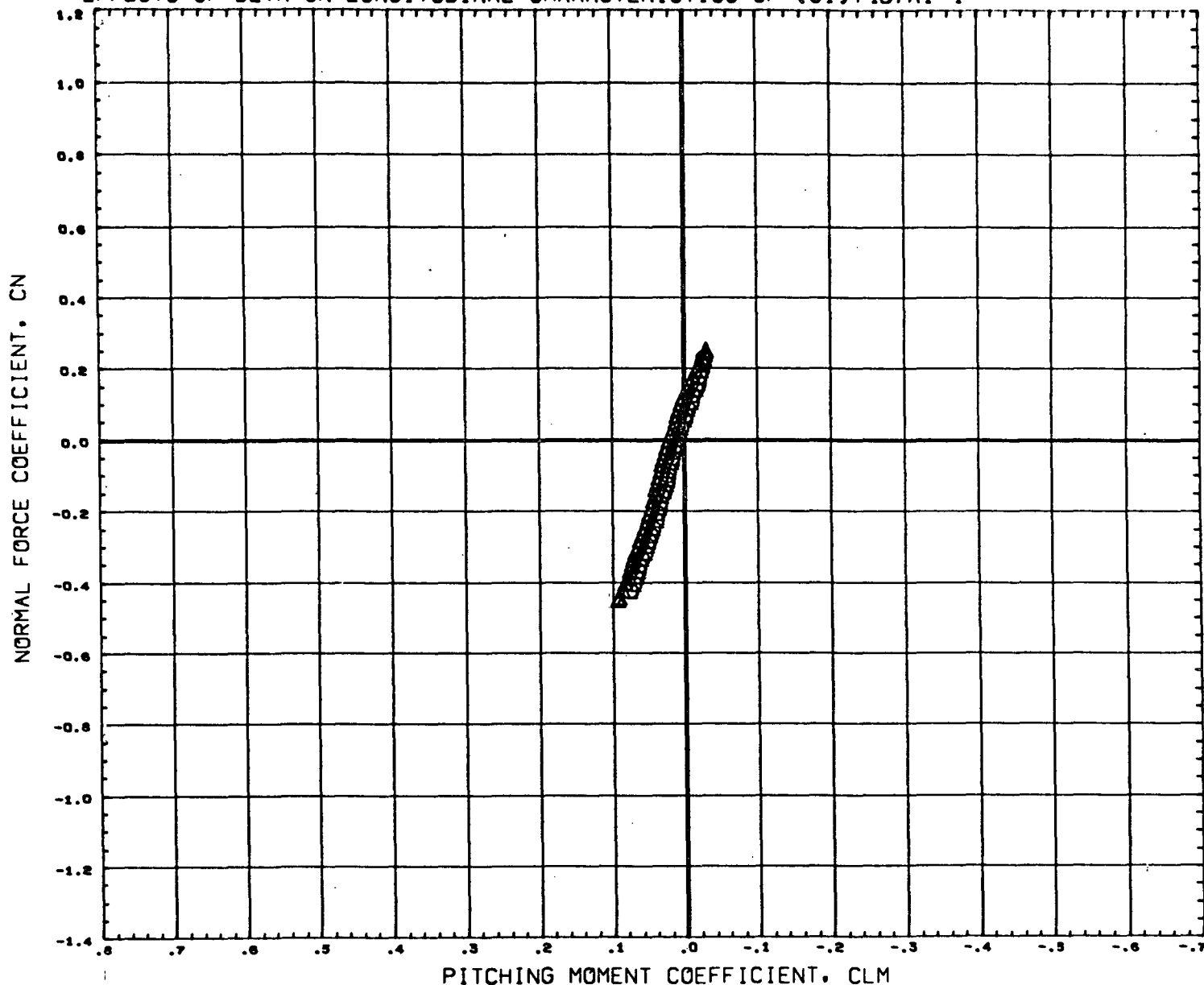


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-----------------|--|-------|--------|--------|--------|-----------------------|-----------|--------|
| (C074C7) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| (C074C9) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | | | BREF | 882.0004 | IN. |
| | | | | | | XMRP | 557.0004 | IN. |
| | | | | | | YMRP | 0.0000 | IN. |
| | | | | | | ZMRP | 200.0004 | IN. |
| | | | | | | SCALE | 0.0060 | SCALE |

MACH 2.20

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4

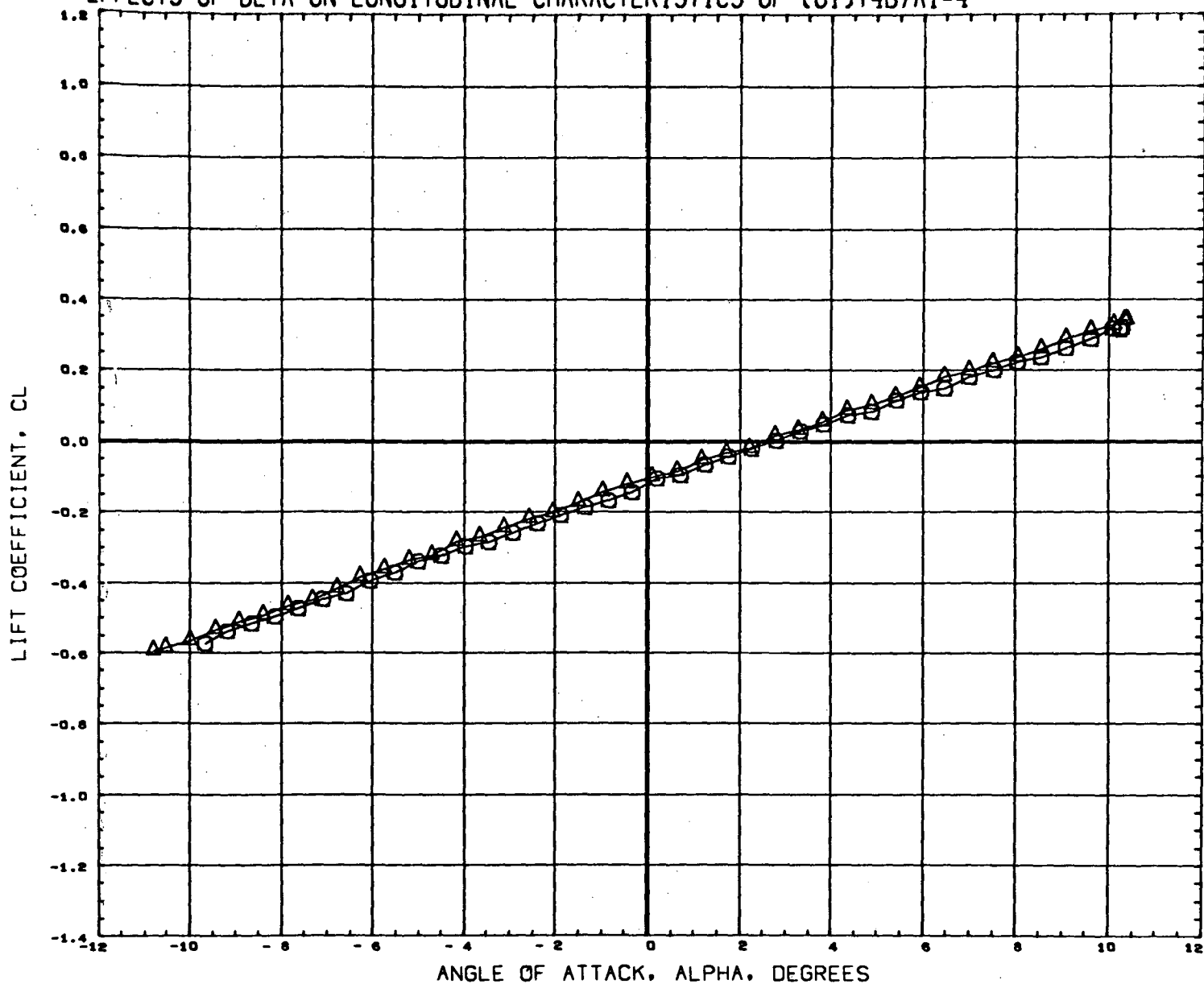


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74C9) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

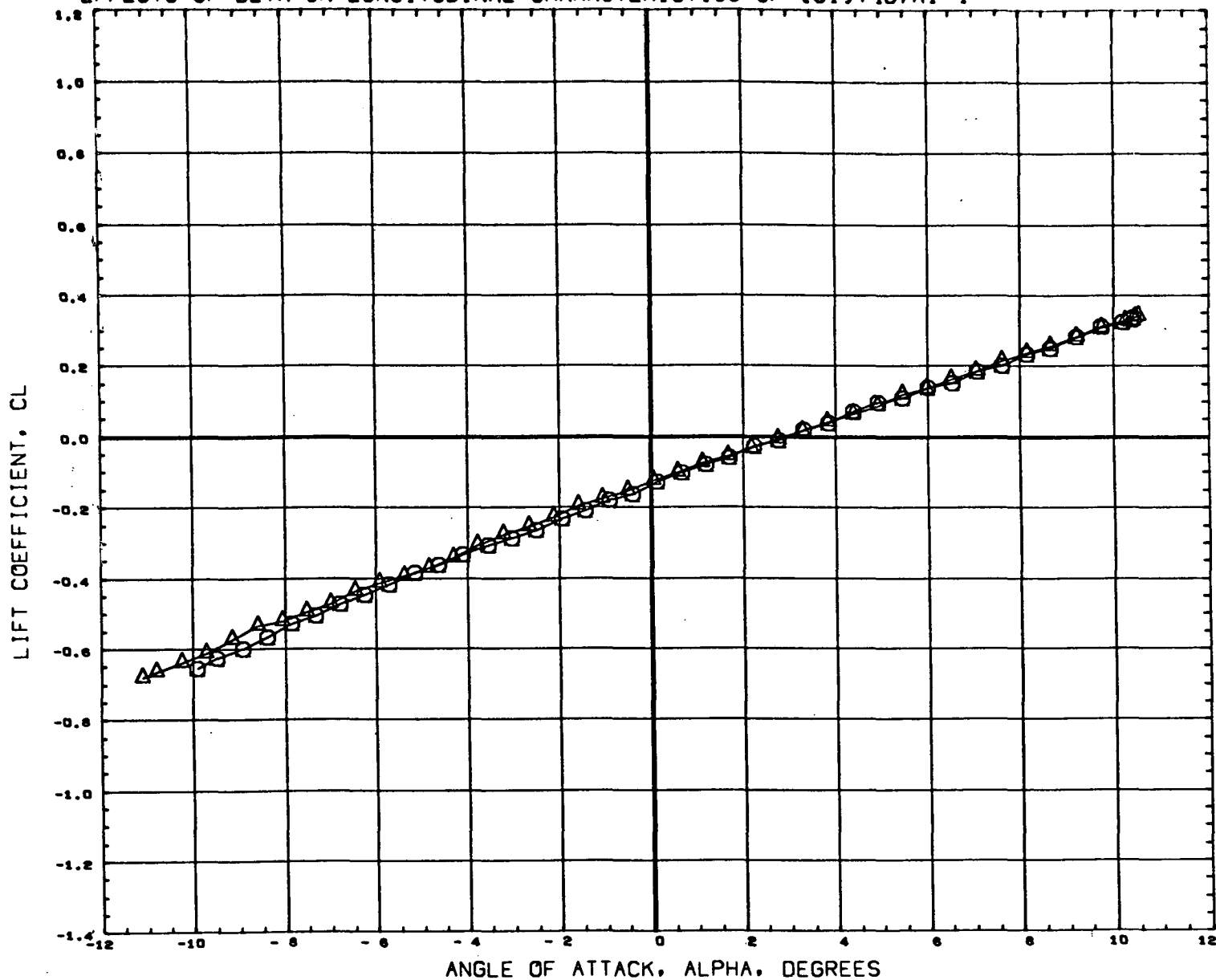
BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 6.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 597.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CP74C7) ○ MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CP74C9) △ MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

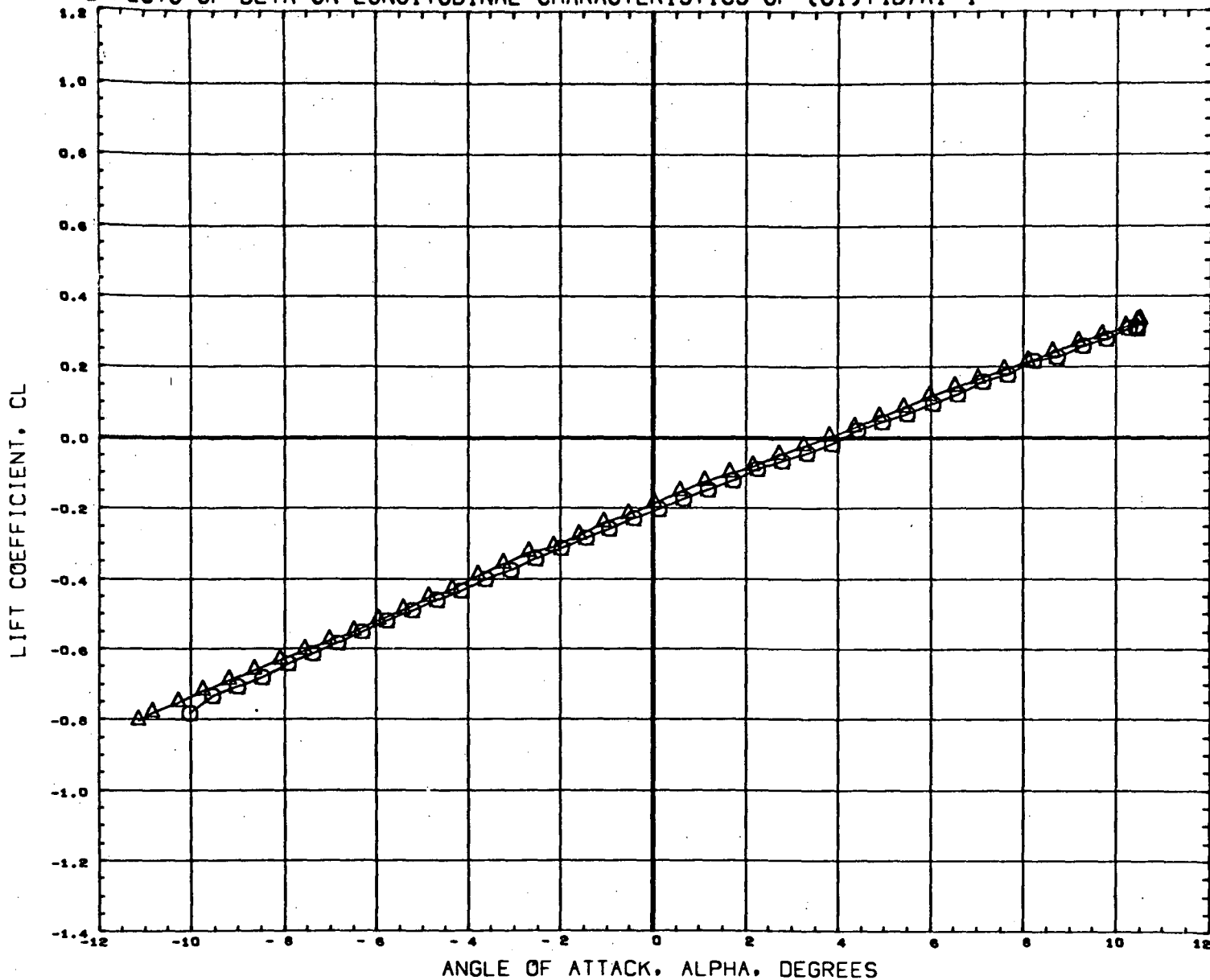
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XHRP | 557.0004 | IN. |
| YHRP | 0.0000 | IN. |
| ZHRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4



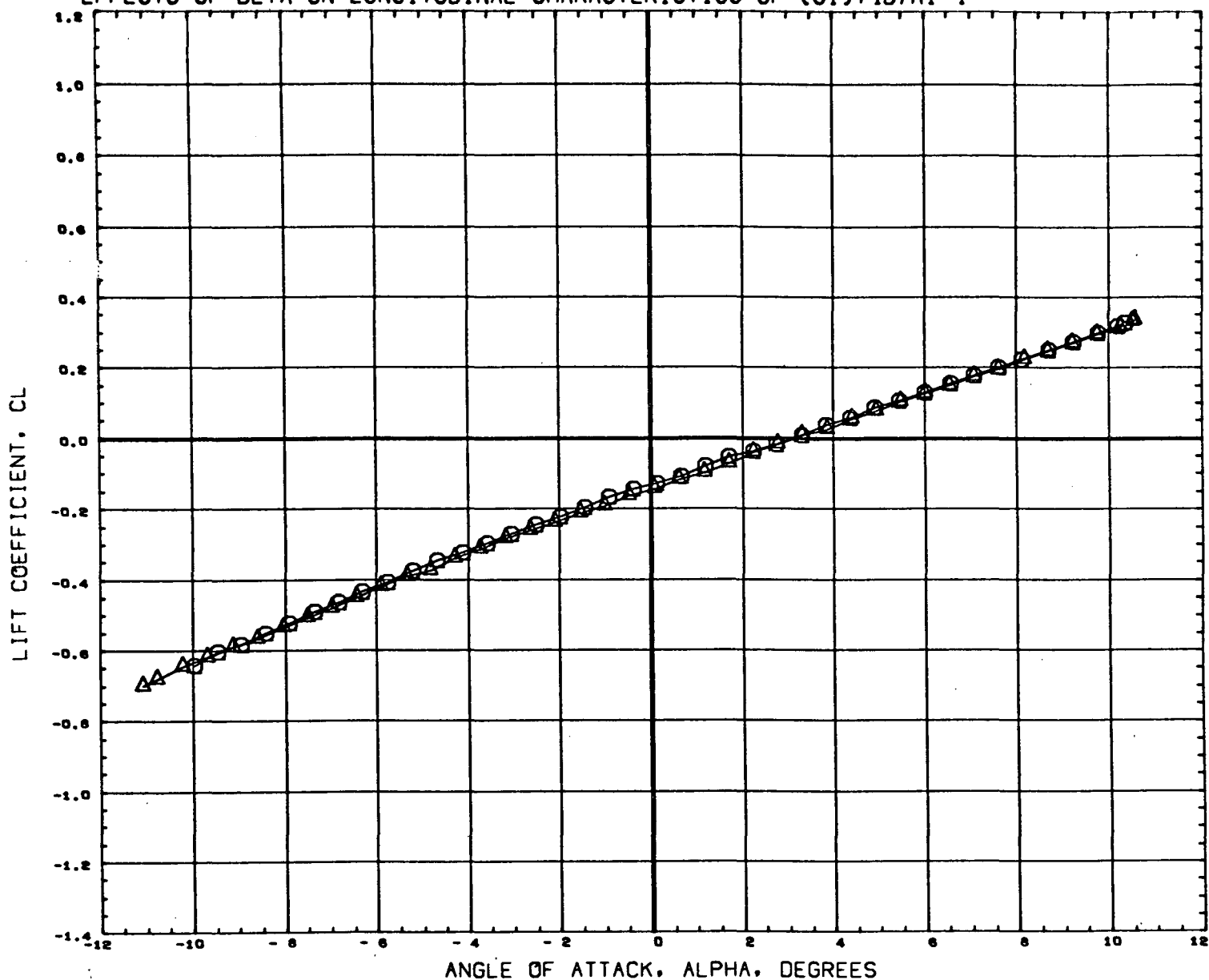
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-------|--------|--------|--------|-----------------------|-----------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | BREF | 882.0004 | IN. |
| | | | | XMRP | 557.0004 | IN. |
| | | | | YMRP | 0.0000 | IN. |
| | | | | ZMRP | 200.0004 | IN. |
| | | | | SCALE | 0.0060 | SCALE |

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (cp74c7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (cp74c9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 537.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

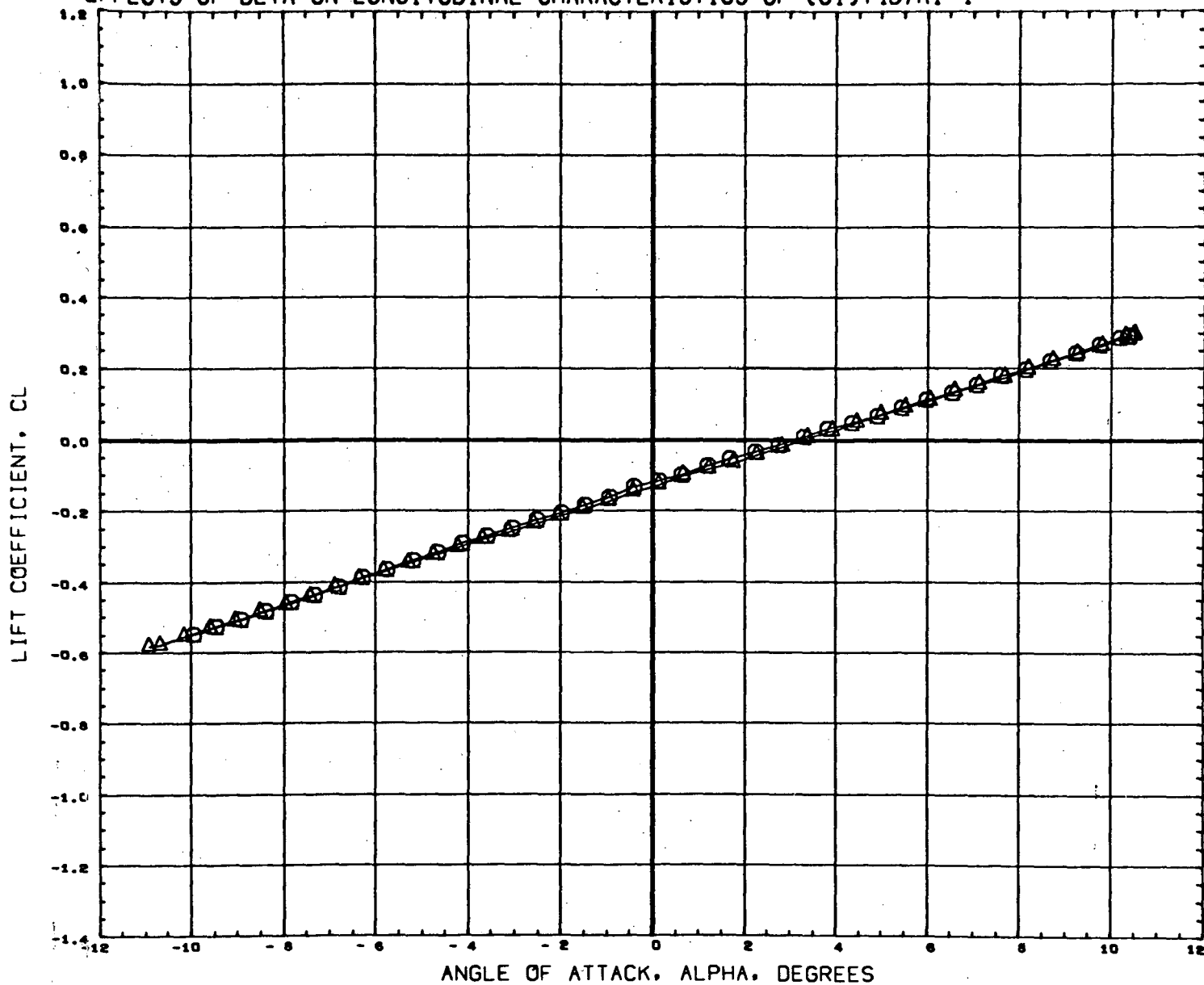
MACH

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4



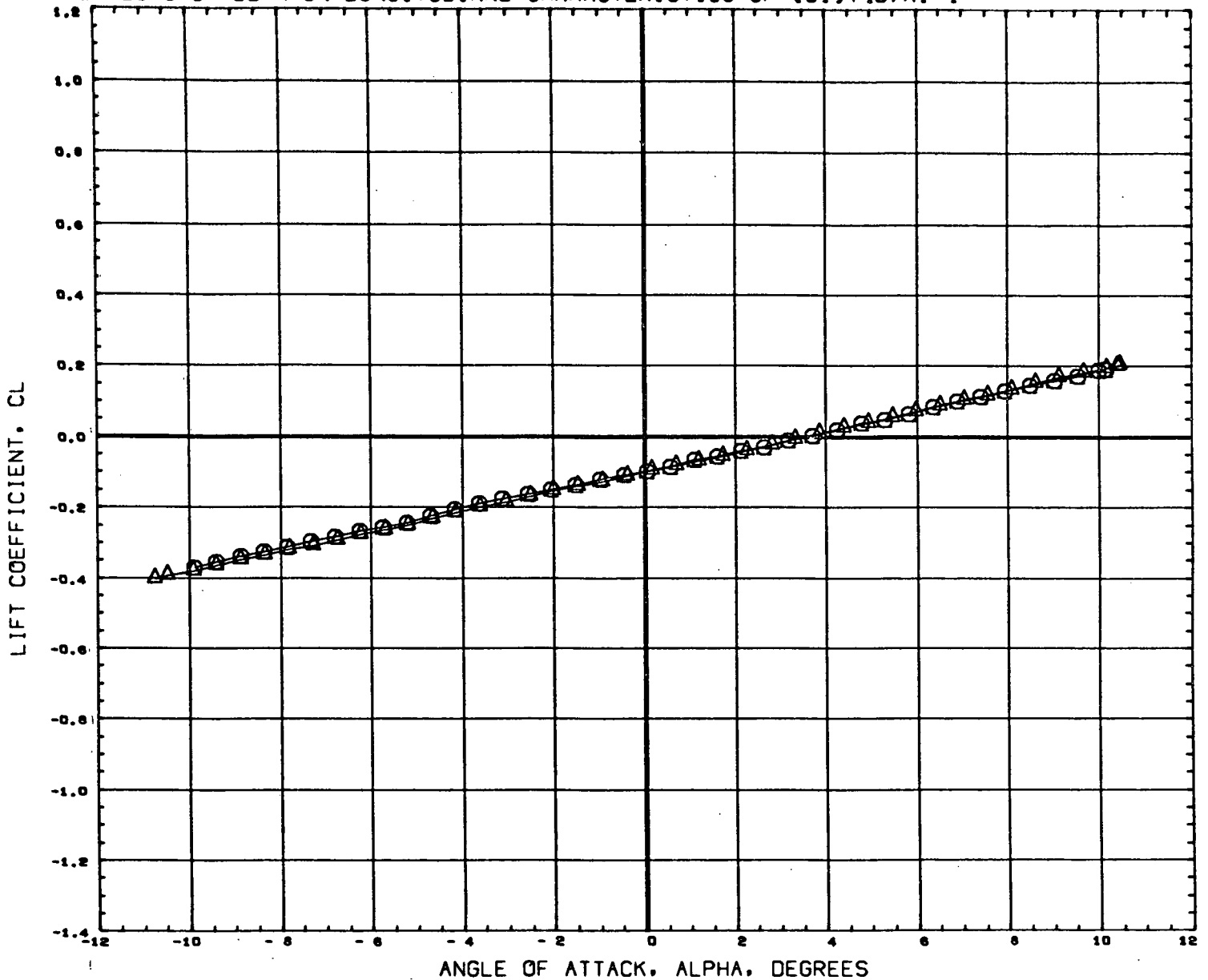
DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
 (CD74C9) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.3004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4



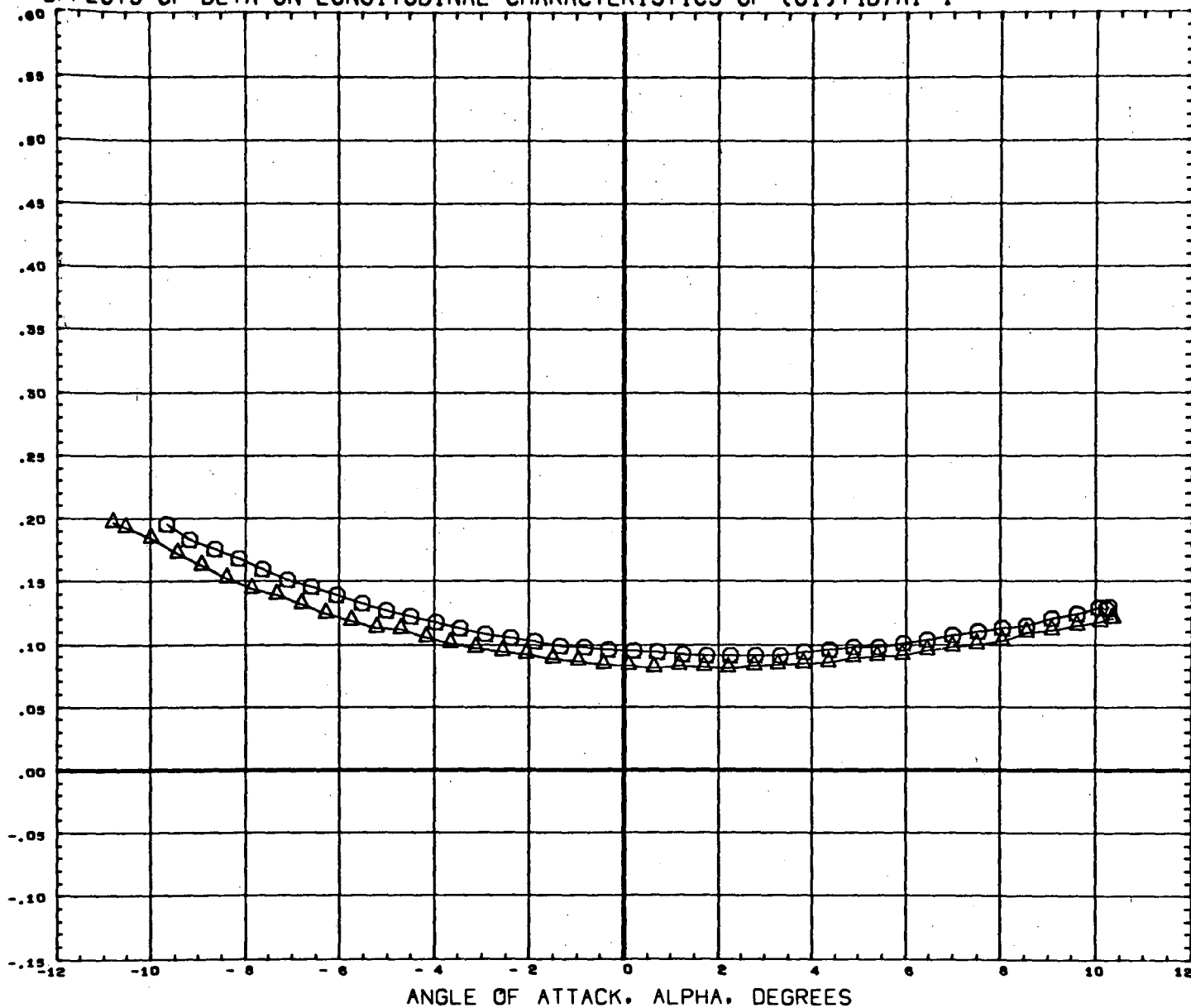
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4

FOREBODY DRAG COEFFICIENT, CDF



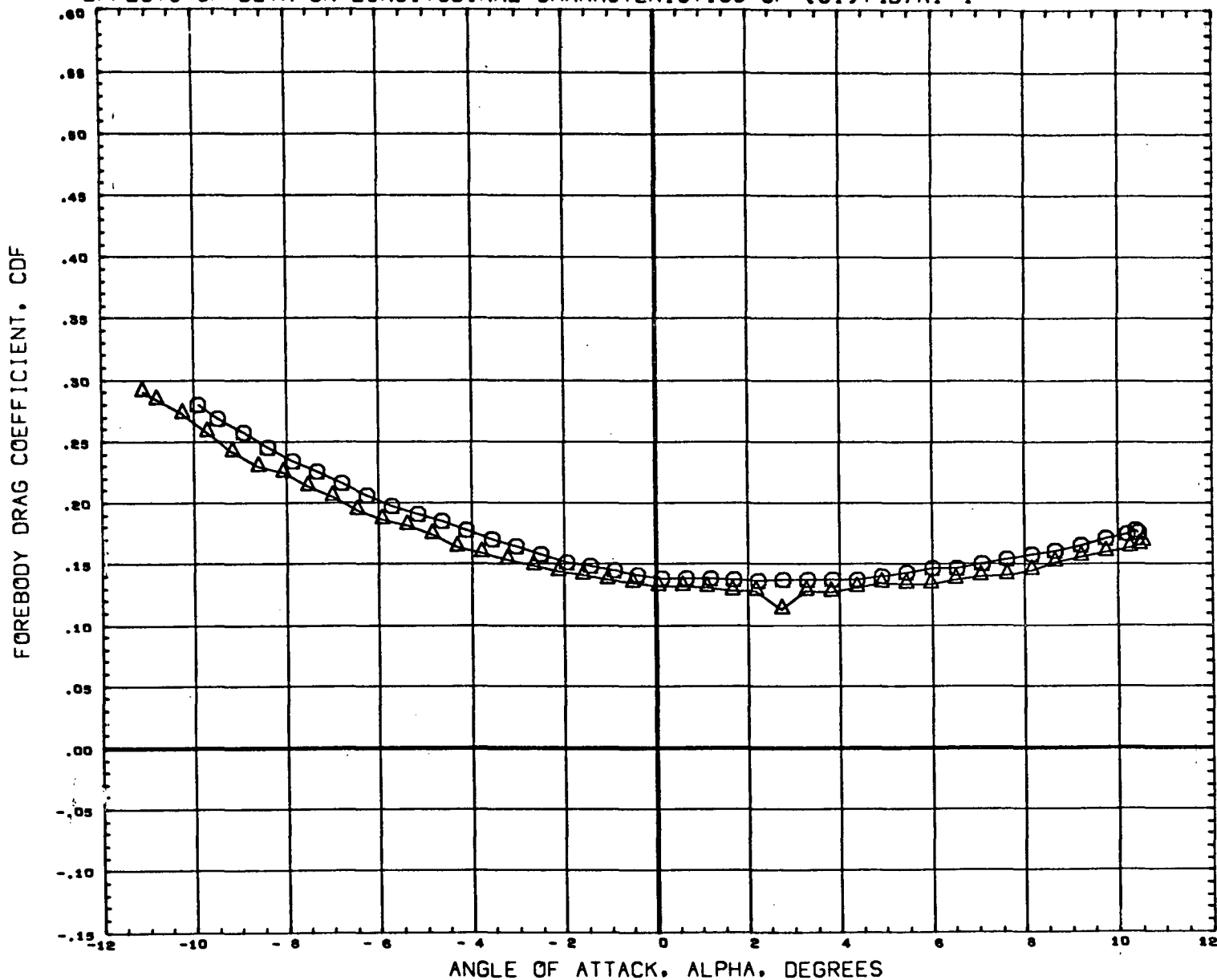
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-------|--------|--------|--------|-----------------------|-----------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | BREF | 662.0004 | IN. |
| | | | | XMRP | 557.0004 | IN. |
| | | | | YMRP | 0.0000 | IN. |
| | | | | ZMRP | 200.0004 | IN. |
| | | | | SCALE | 0.0060 | SCALE |

MACH .58

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 |
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 |

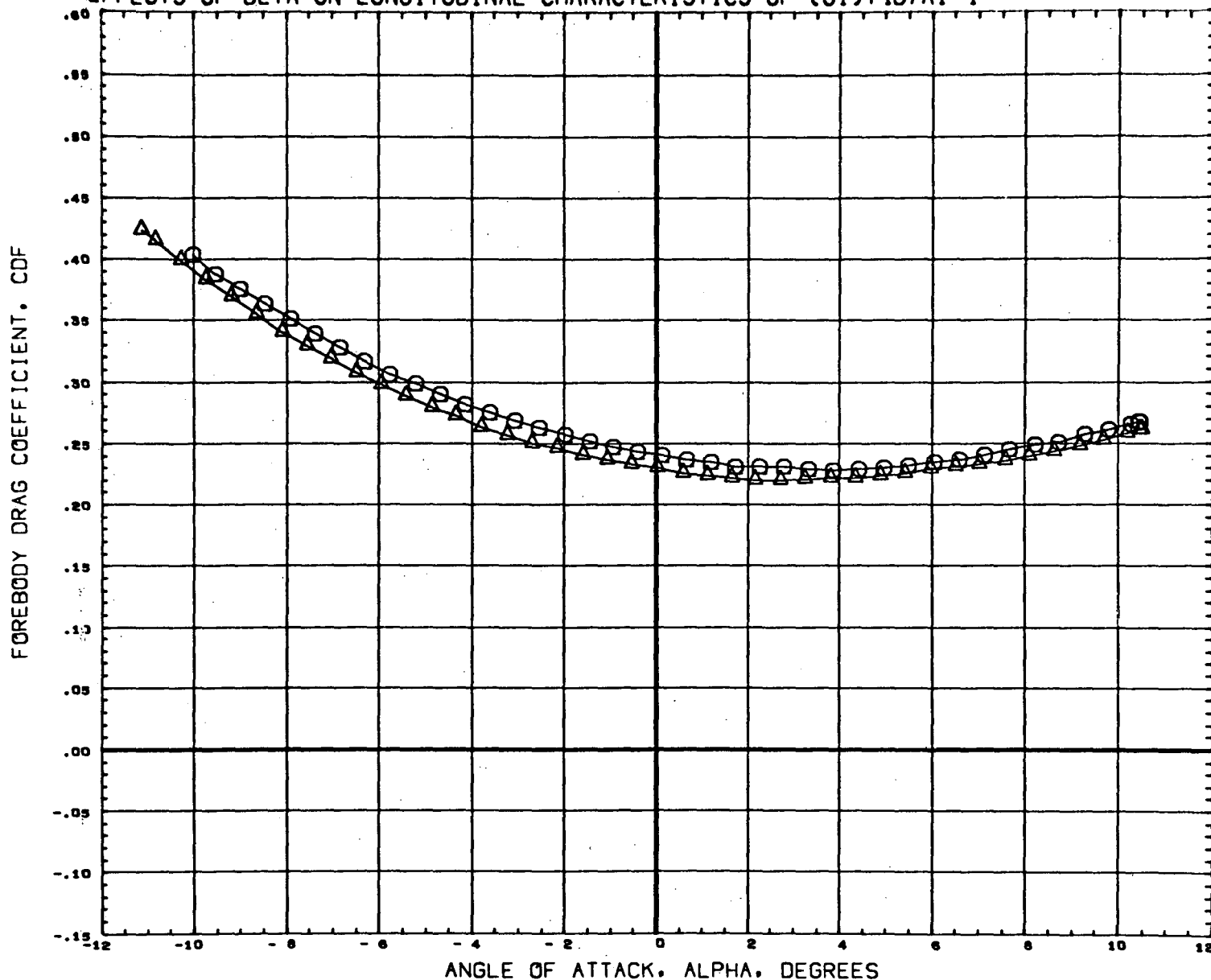
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 662.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) (CD74C9) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

BETA ELEVTR AILRON RUDDER
0.000 0.000 0.000 0.000
6.000 0.000 0.000 0.000

REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060 SCALE

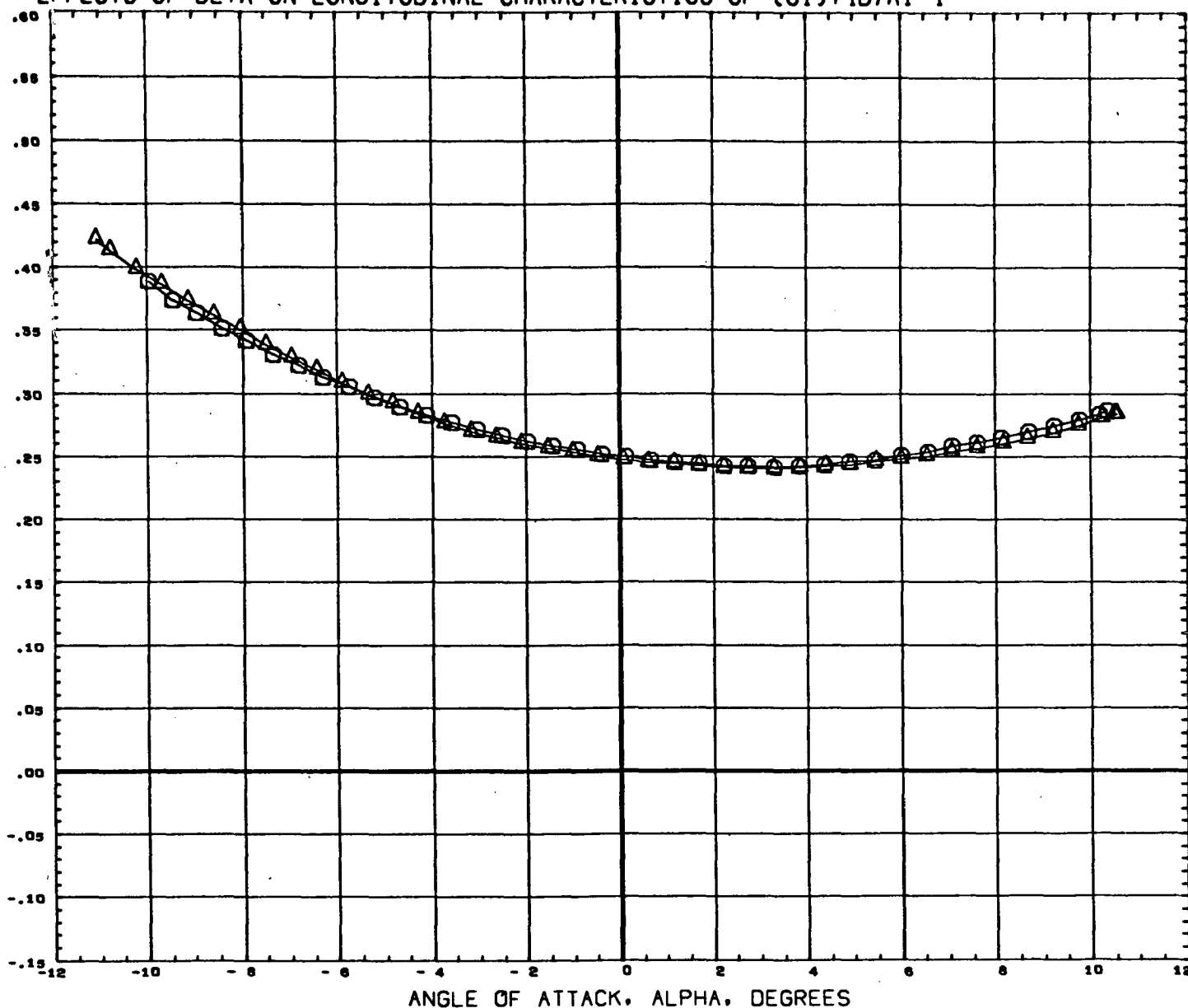
MACH

1.08

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4

FOREBODY DRAG COEFFICIENT, CDF



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH

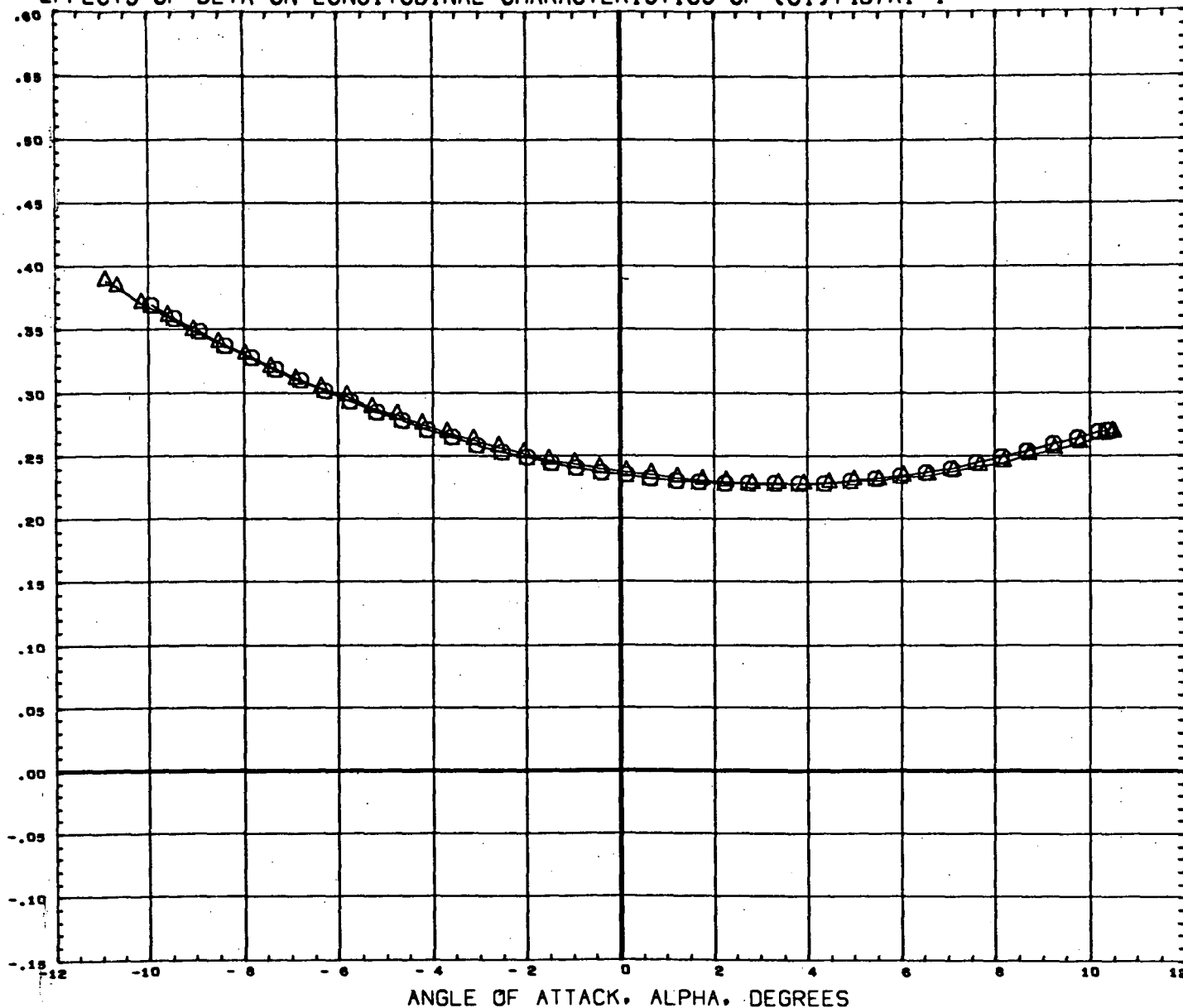
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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4

FOREBODY DRAG COEFFICIENT, CDF



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |

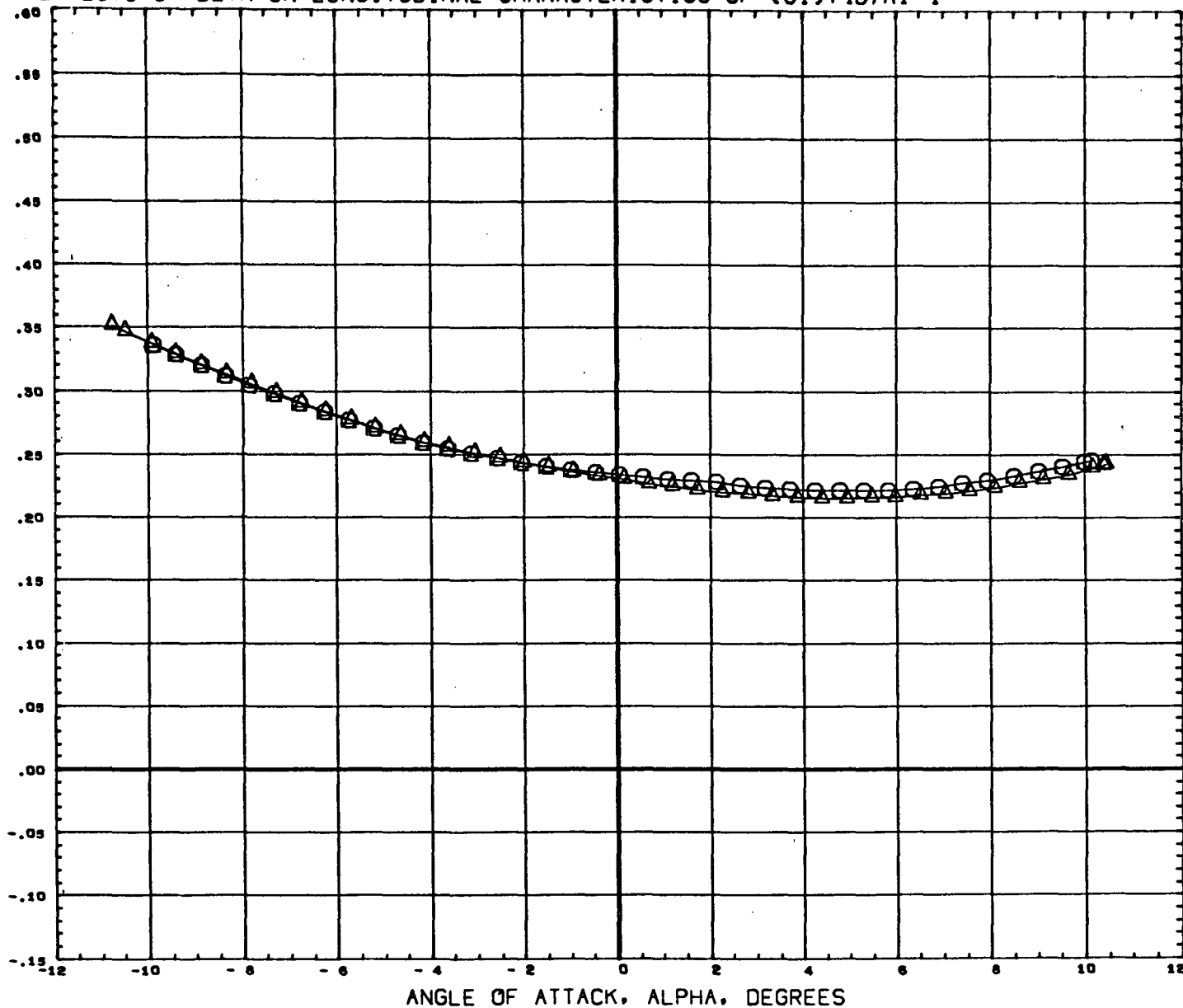
| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 537.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH 2.20

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4

FOREBODY DRAG COEFFICIENT, CDF



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) MDAC S-222 COMPOSITE(T-C6) (01)T4B7A1-4
 (CD74C9) MDAC S-222 COMPOSITE(T-C6) (01)T4B7A1-4

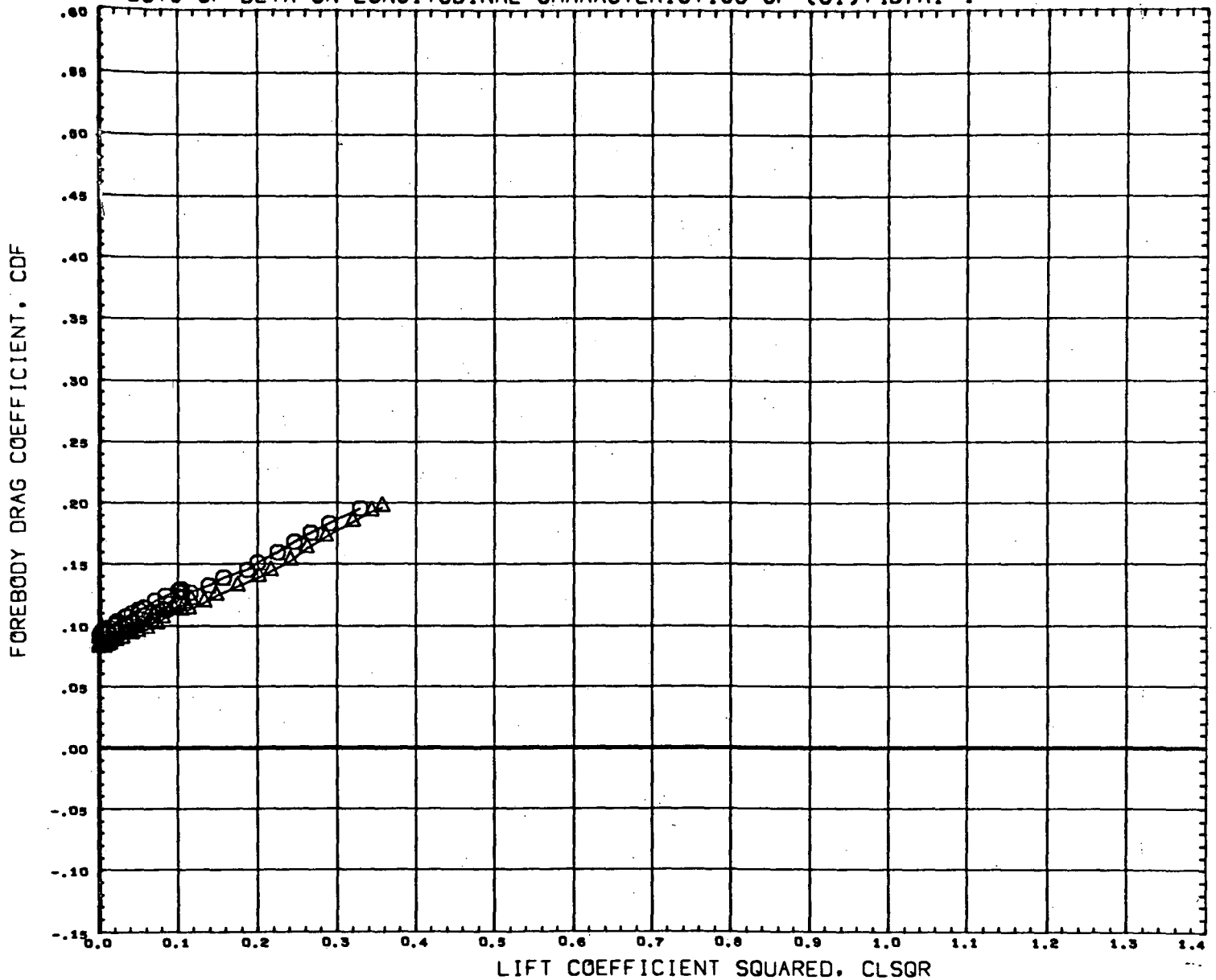
BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 6.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4



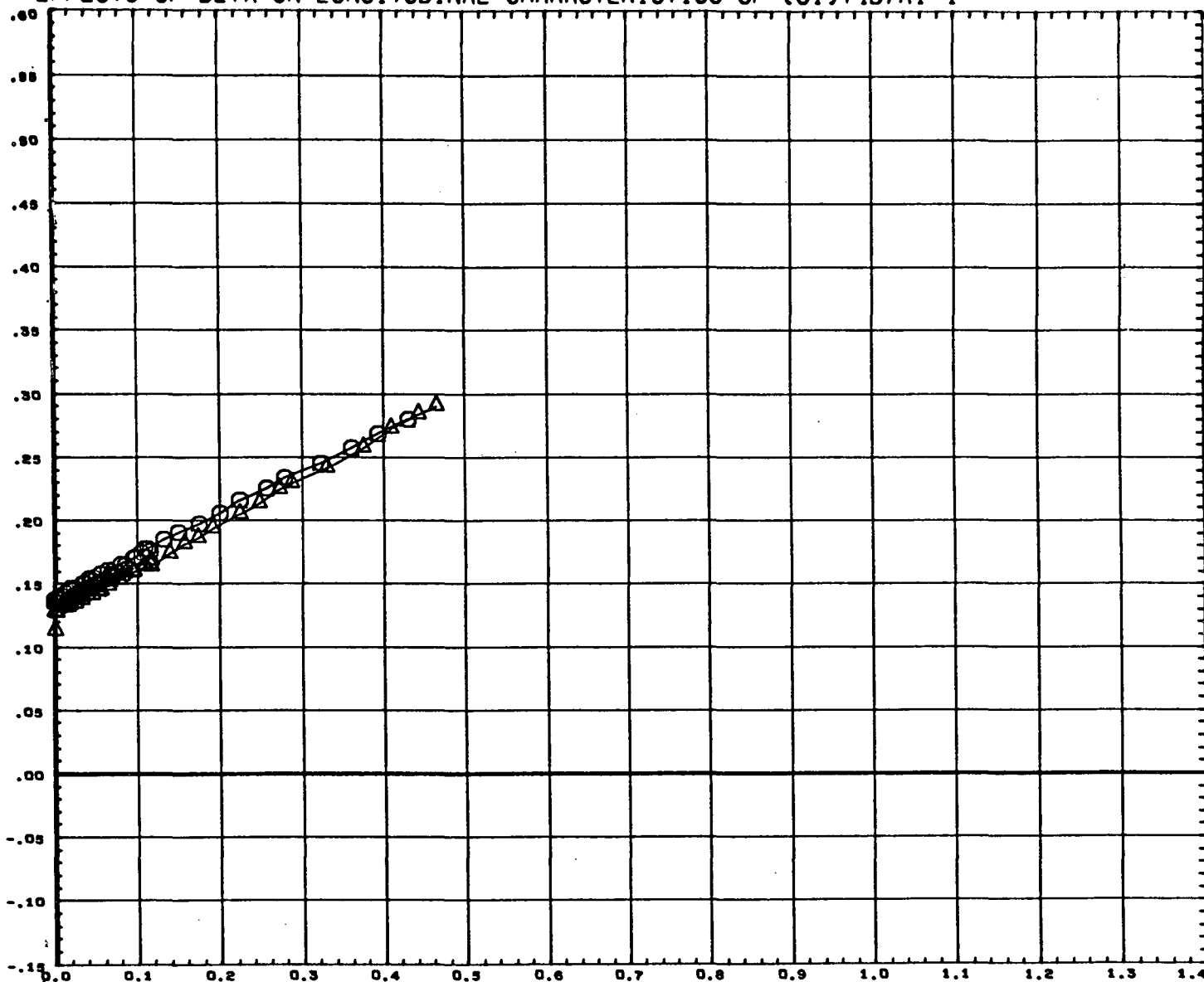
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-----------------|---|-------|--------|--------|--------|-----------------------|-----------|--------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | | | BREF | 882.0004 | IN. |
| | | | | | | XMRP | 557.0004 | IN. |
| | | | | | | YMRP | 0.0000 | IN. |
| | | | | | | ZMRP | 200.0004 | IN. |
| | | | | | | SCALE | 0.0060 | SCALE |

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4

FOREBODY DRAG COEFFICIENT, CDF



LIFT COEFFICIENT SQUARED, CLSQR

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |

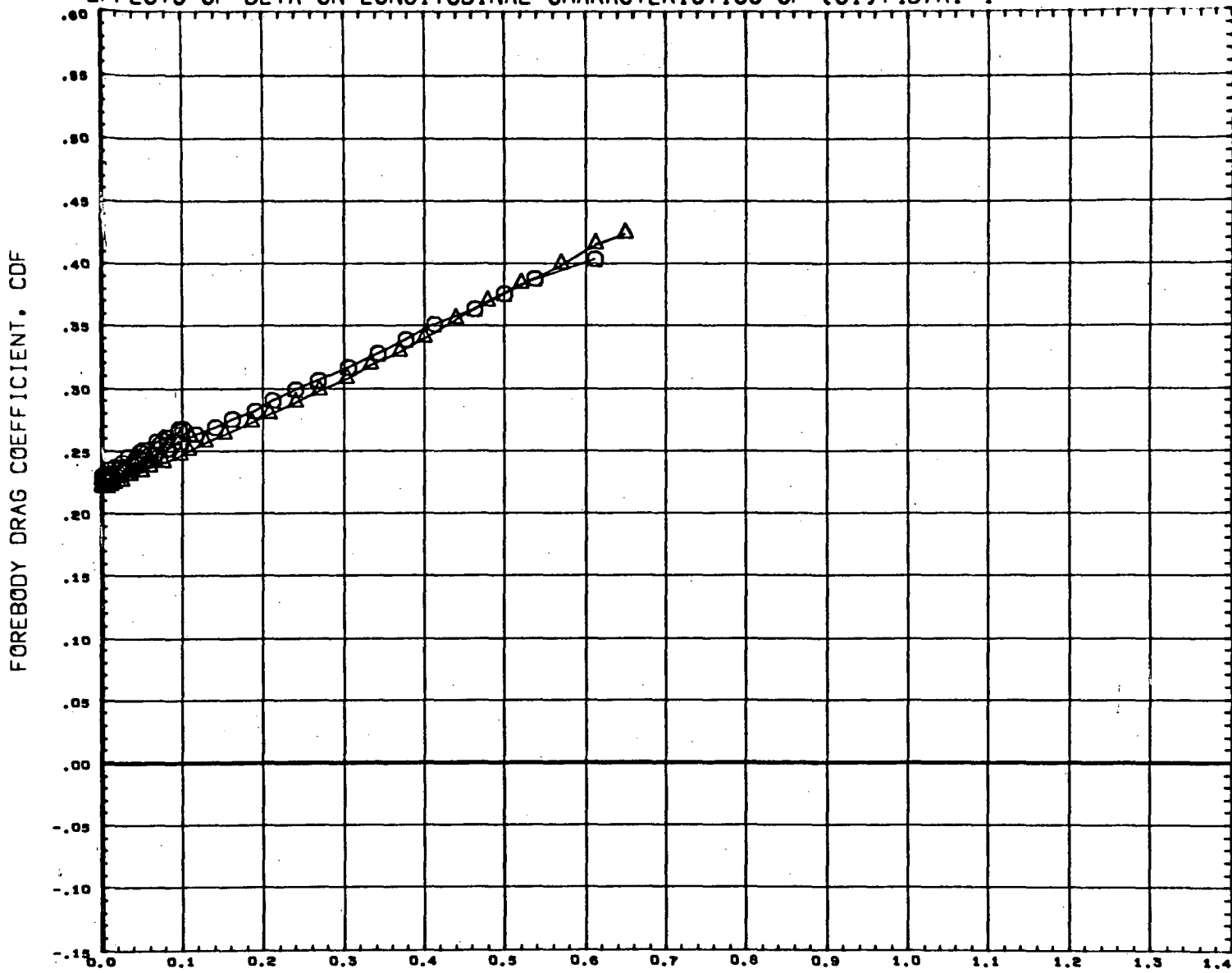
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4



LIFT COEFFICIENT SQUARED, CLSQR

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.3004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRF | 557.0004 IN. |
| | | | | | | YMRF | 0.0000 IN. |
| | | | | | | ZMRF | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

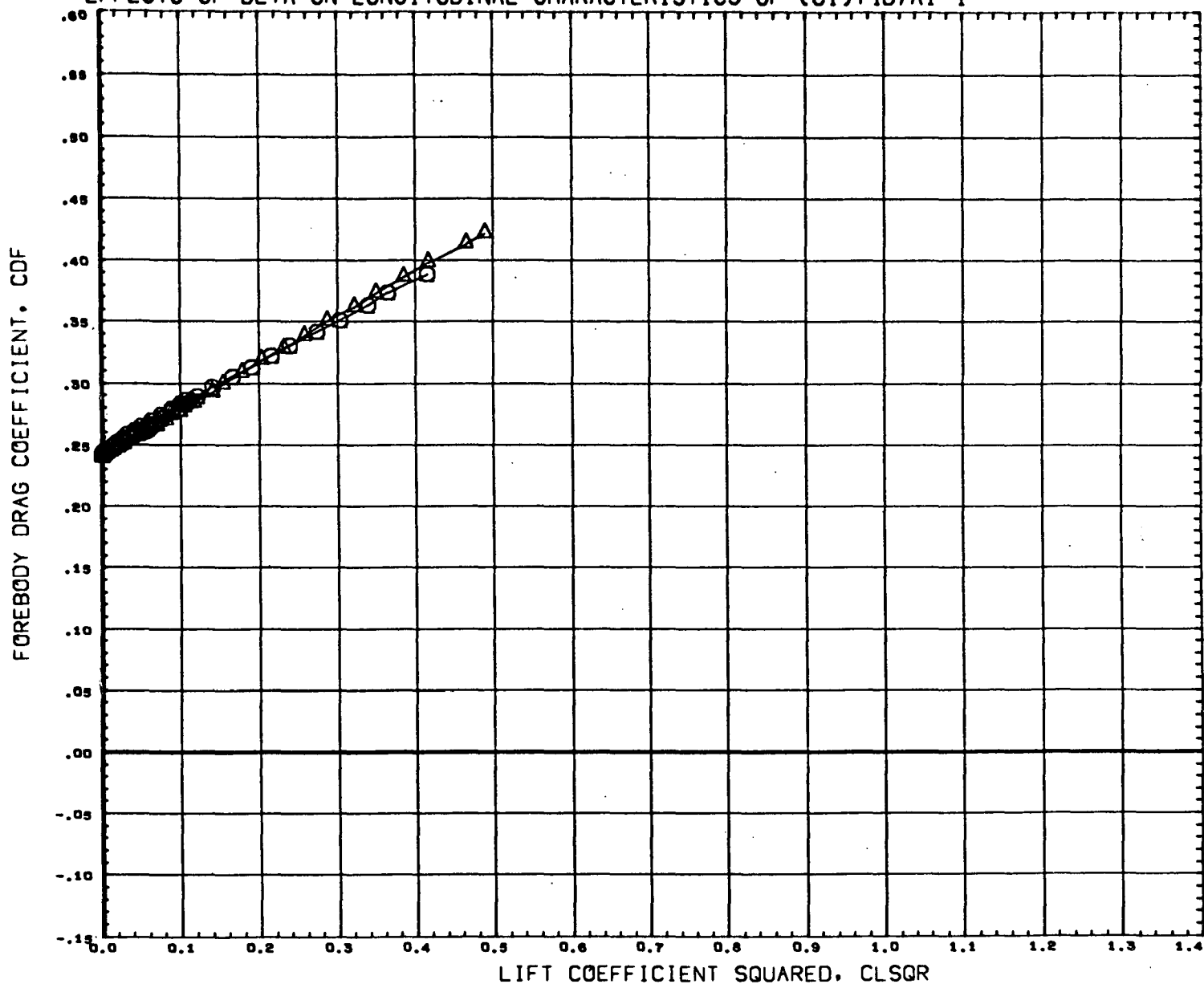
MACH

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74C9) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 6.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 862.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

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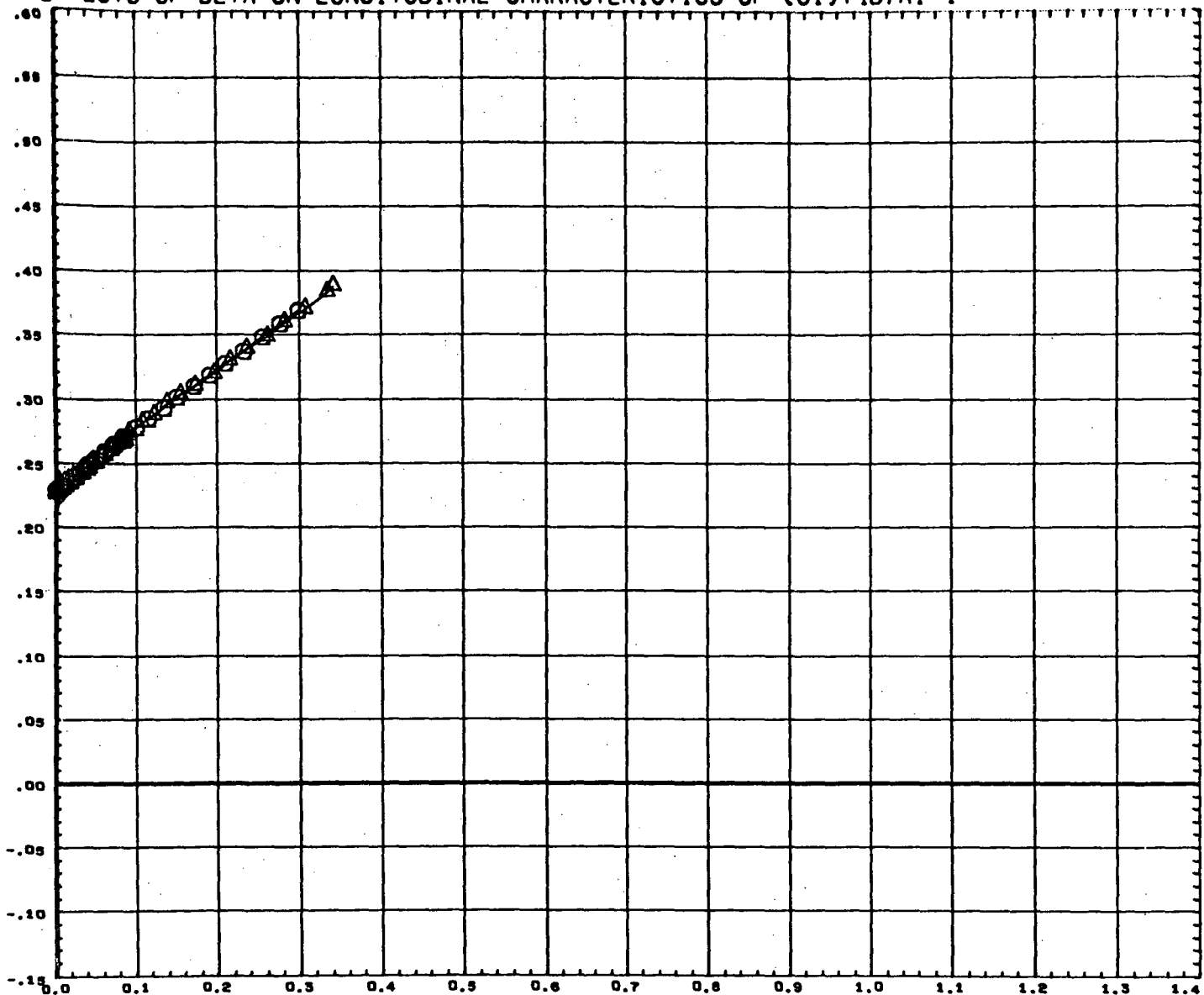
1.51

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4

FOREBODY DRAG COEFFICIENT, CDF



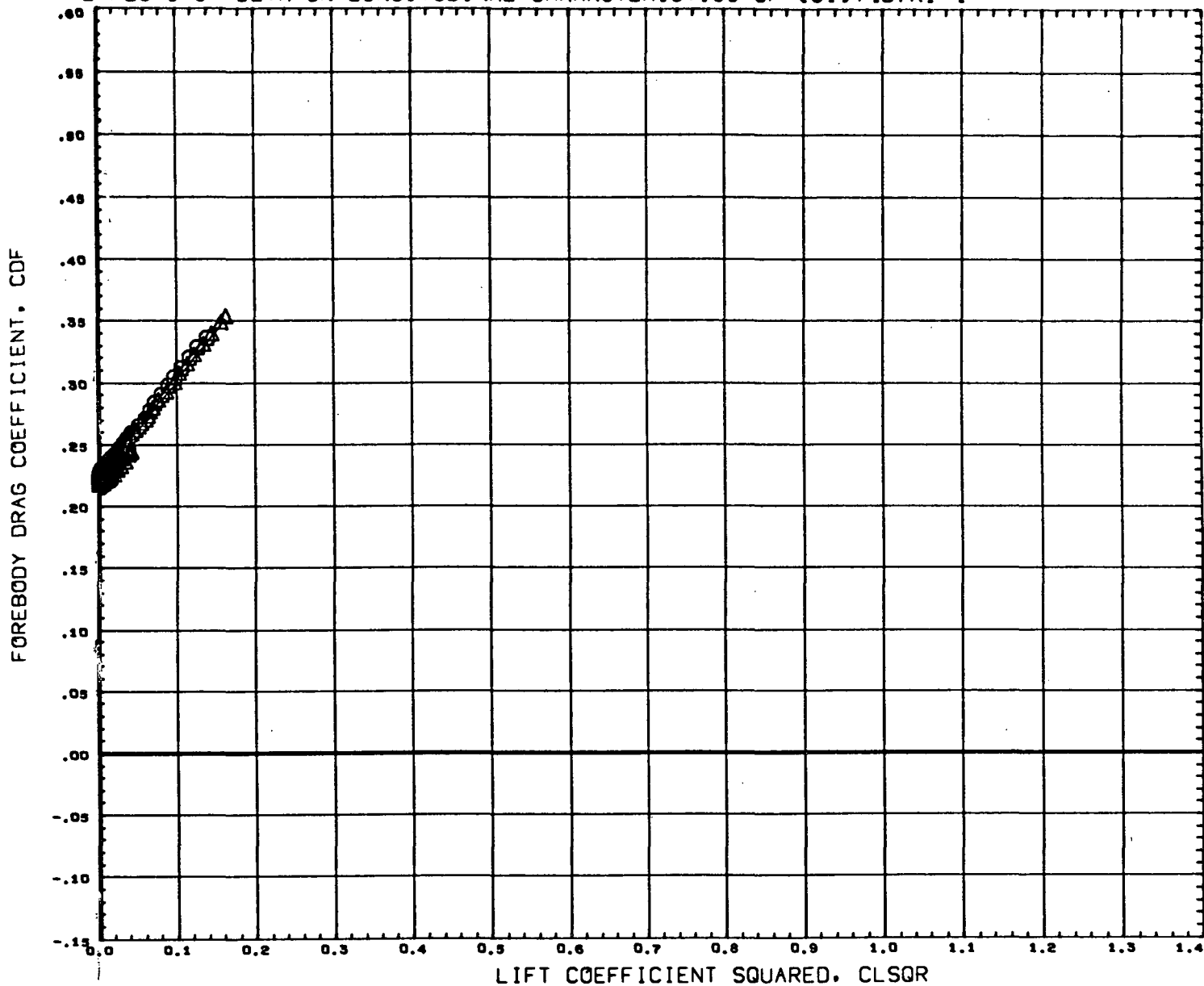
LIFT COEFFICIENT SQUARED, CLSQR

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-C6) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74C9) | MDAC S-222 COMPOSITE(T-C6) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |

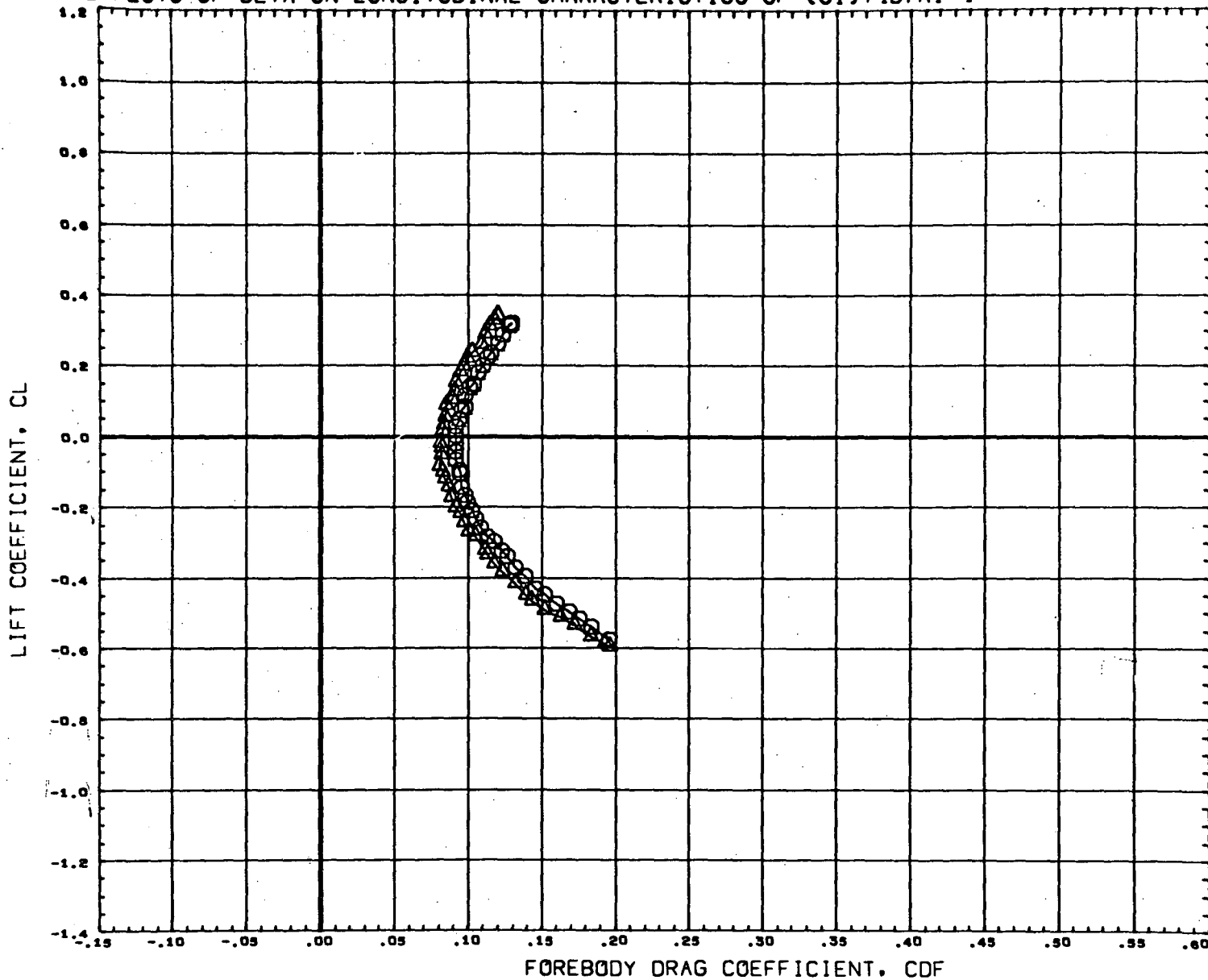
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |



MACH 4.47

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74C9)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

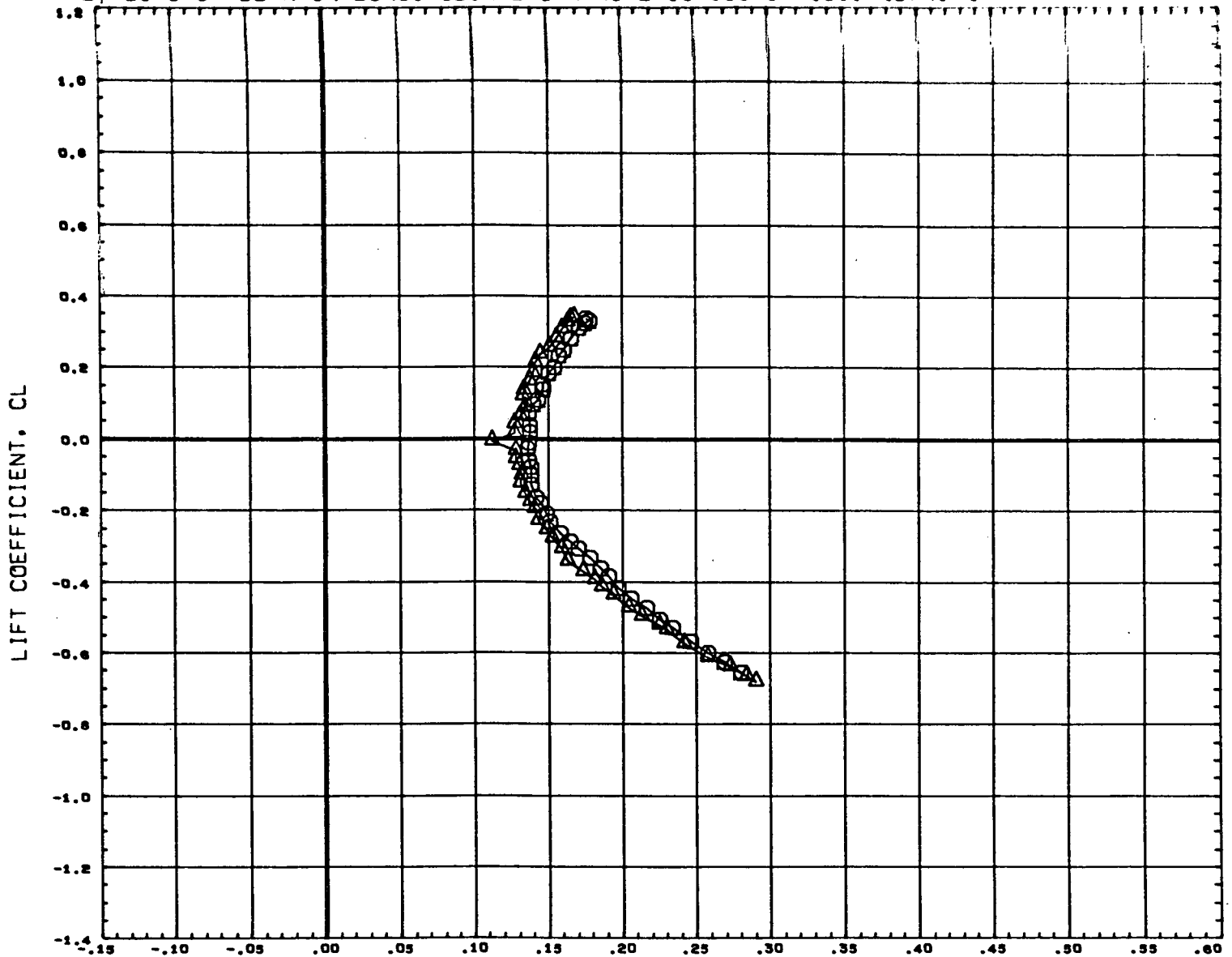
MACH

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4



FOREBODY DRAG COEFFICIENT, CDF

DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
(CD74C9)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

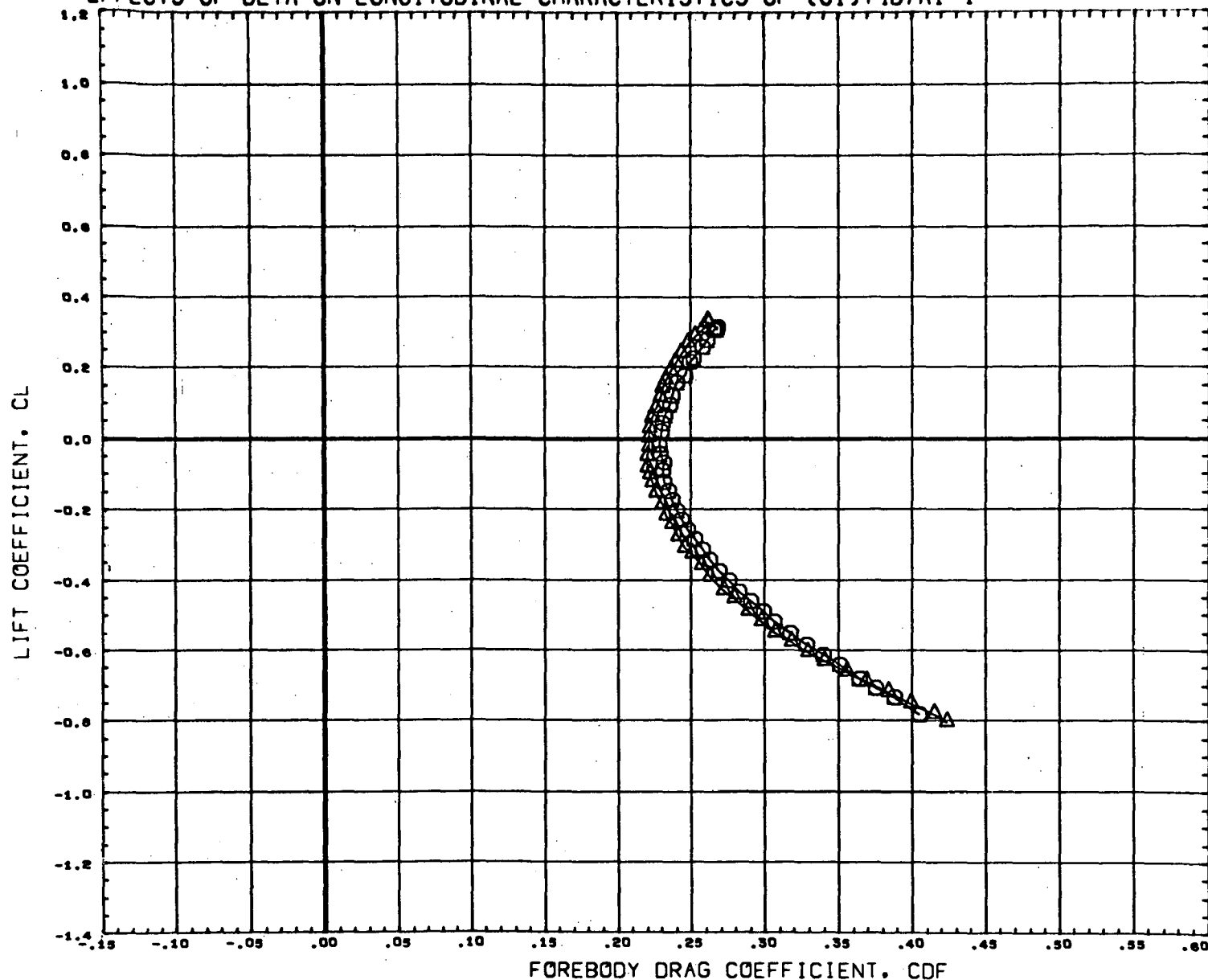
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4



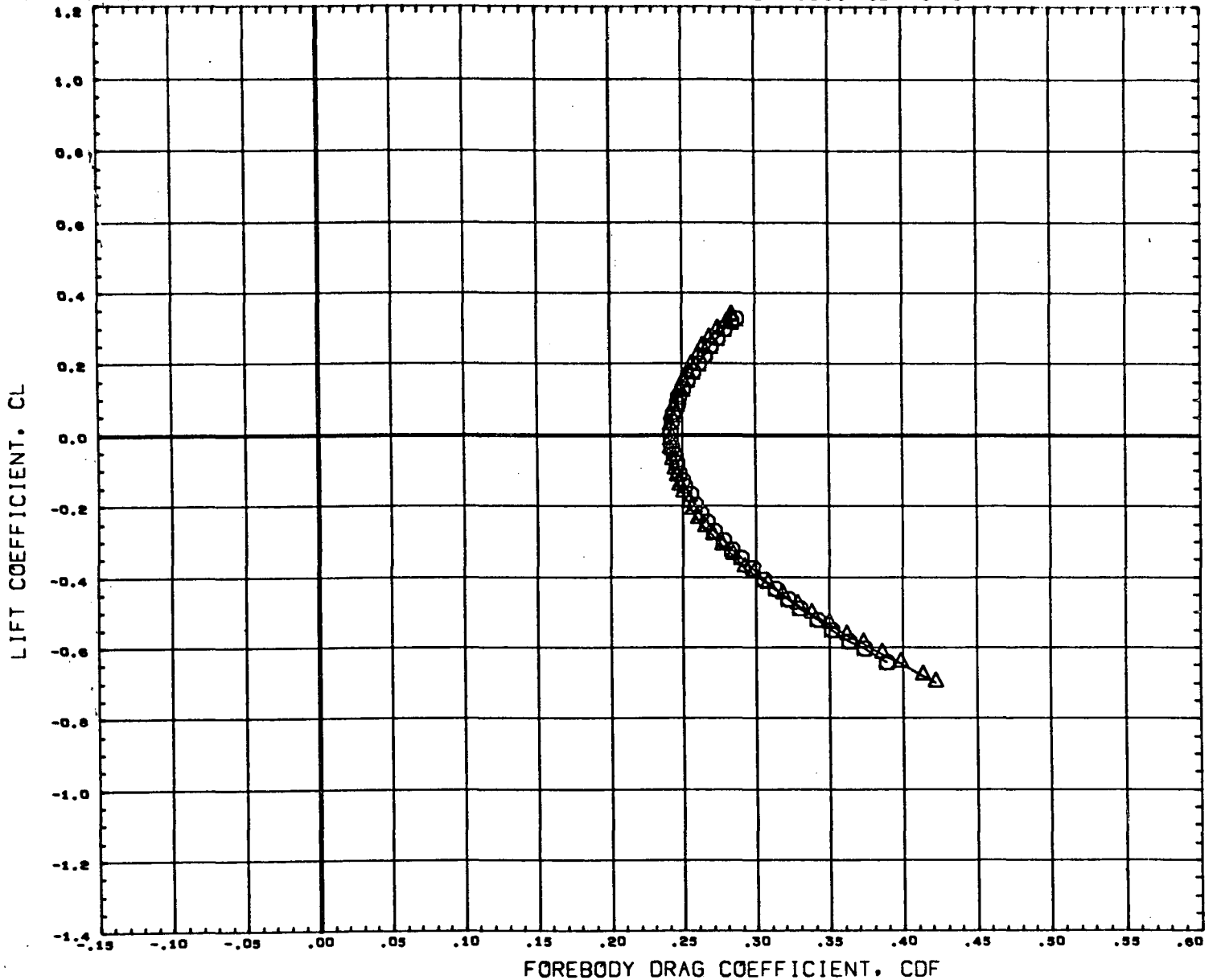
FOREBODY DRAG COEFFICIENT, CDF

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

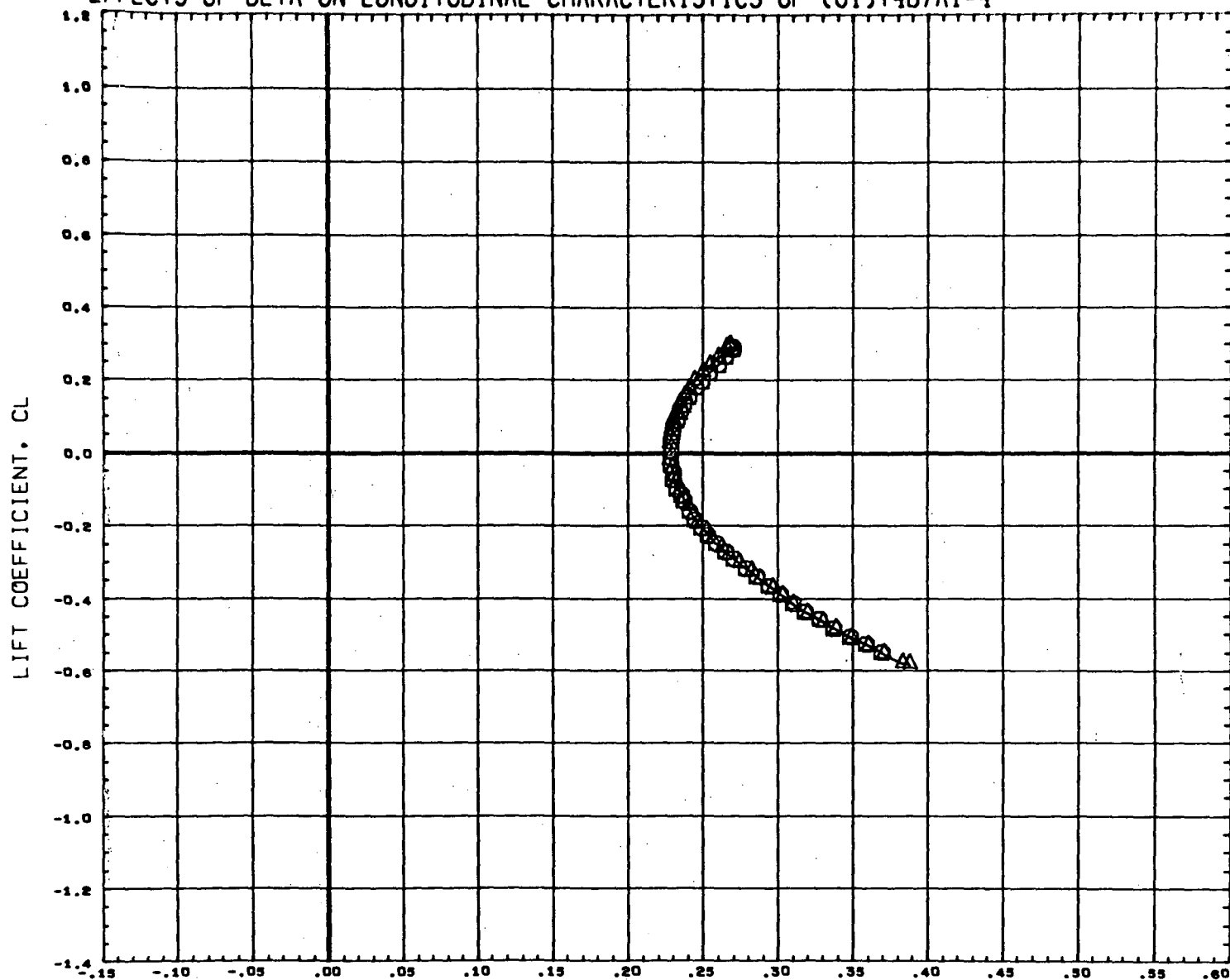
MACH

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4



FOREBODY DRAG COEFFICIENT, CDF

DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
(CD74C9)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

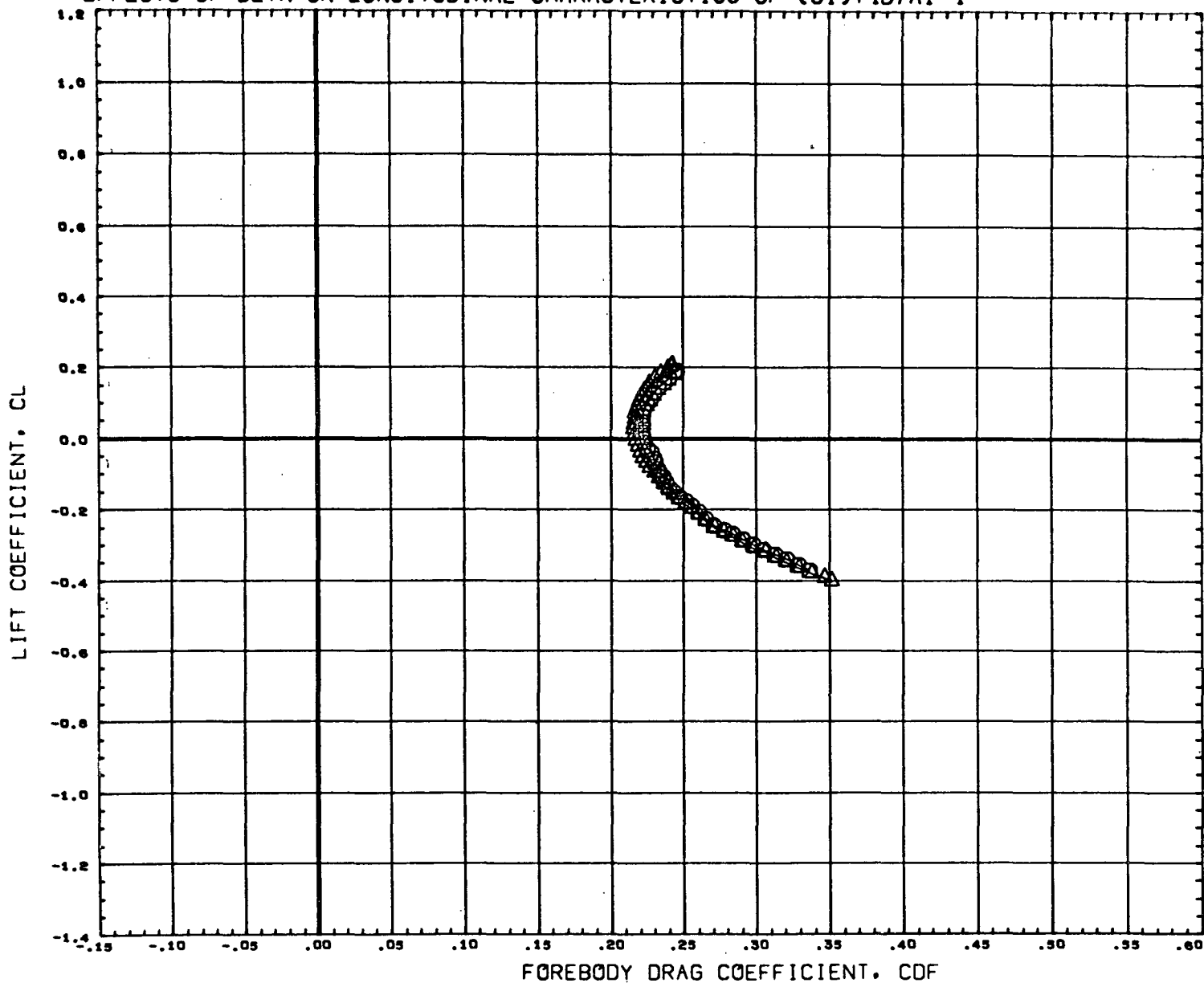
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.3004 | IN. |
| BREF | 682.0004 | IN. |
| XMRP | 957.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4

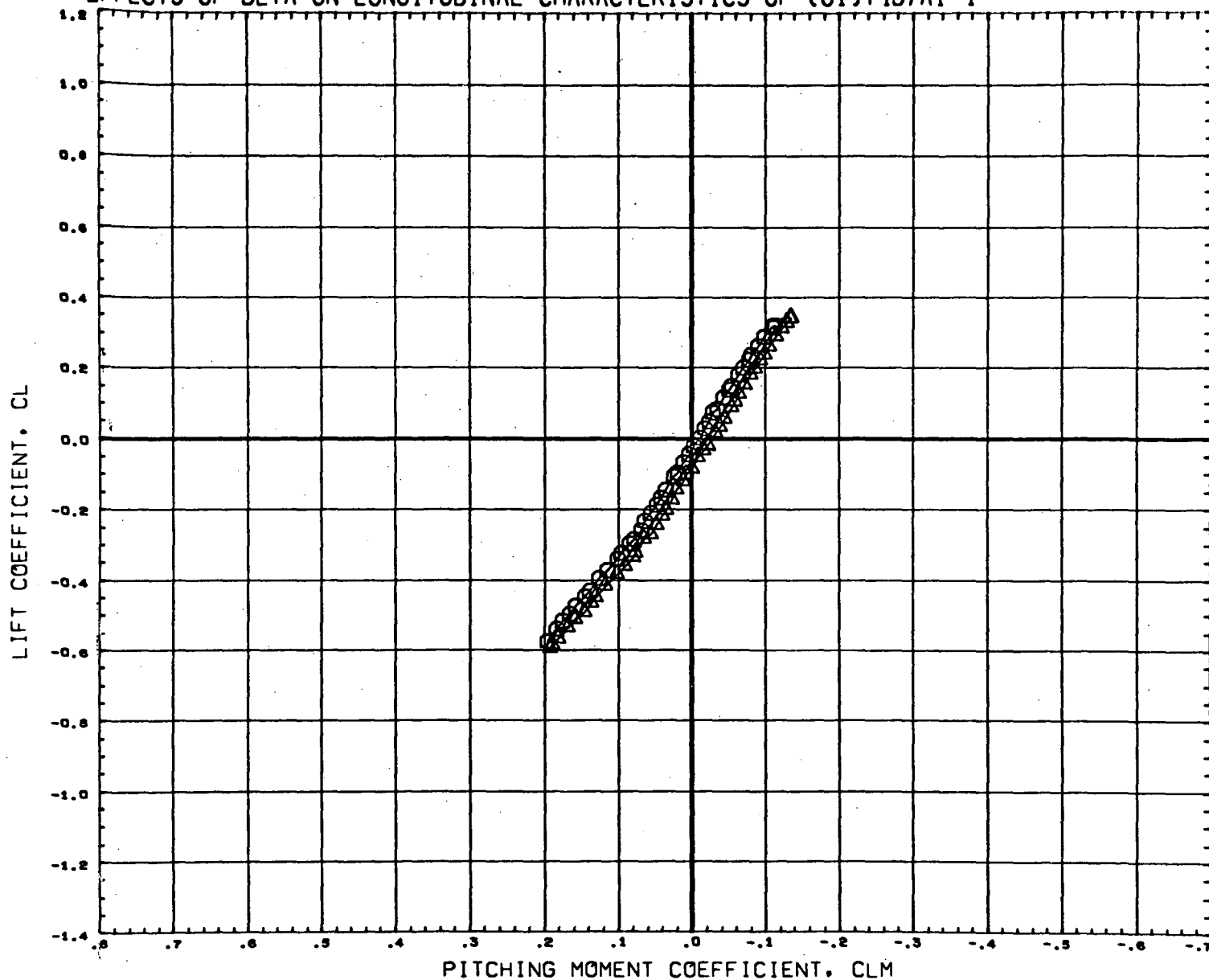


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMHP | 557.0004 IN. |
| | | | | | | YMHP | 0.0000 IN. |
| | | | | | | ZMHP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4

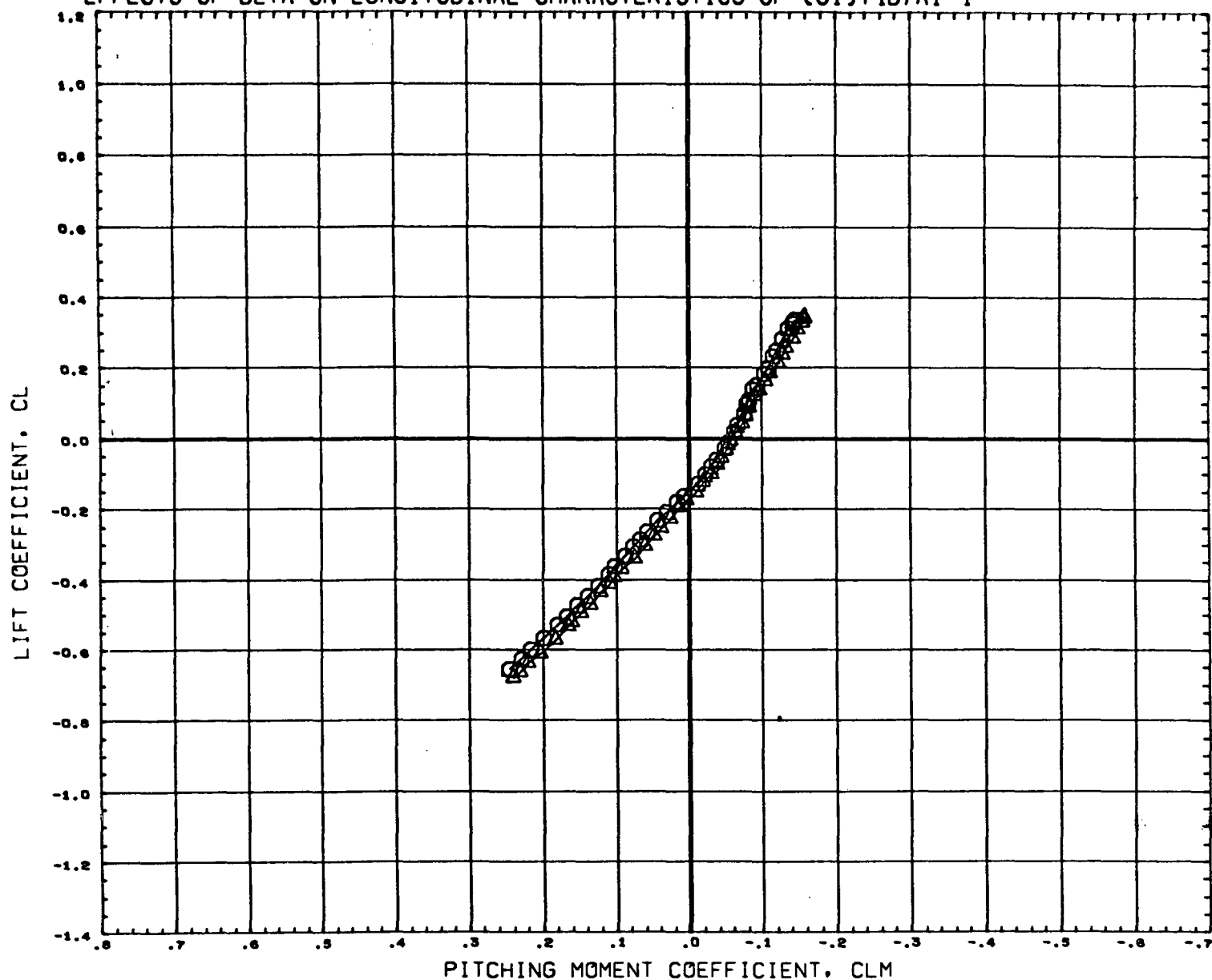


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.3004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4

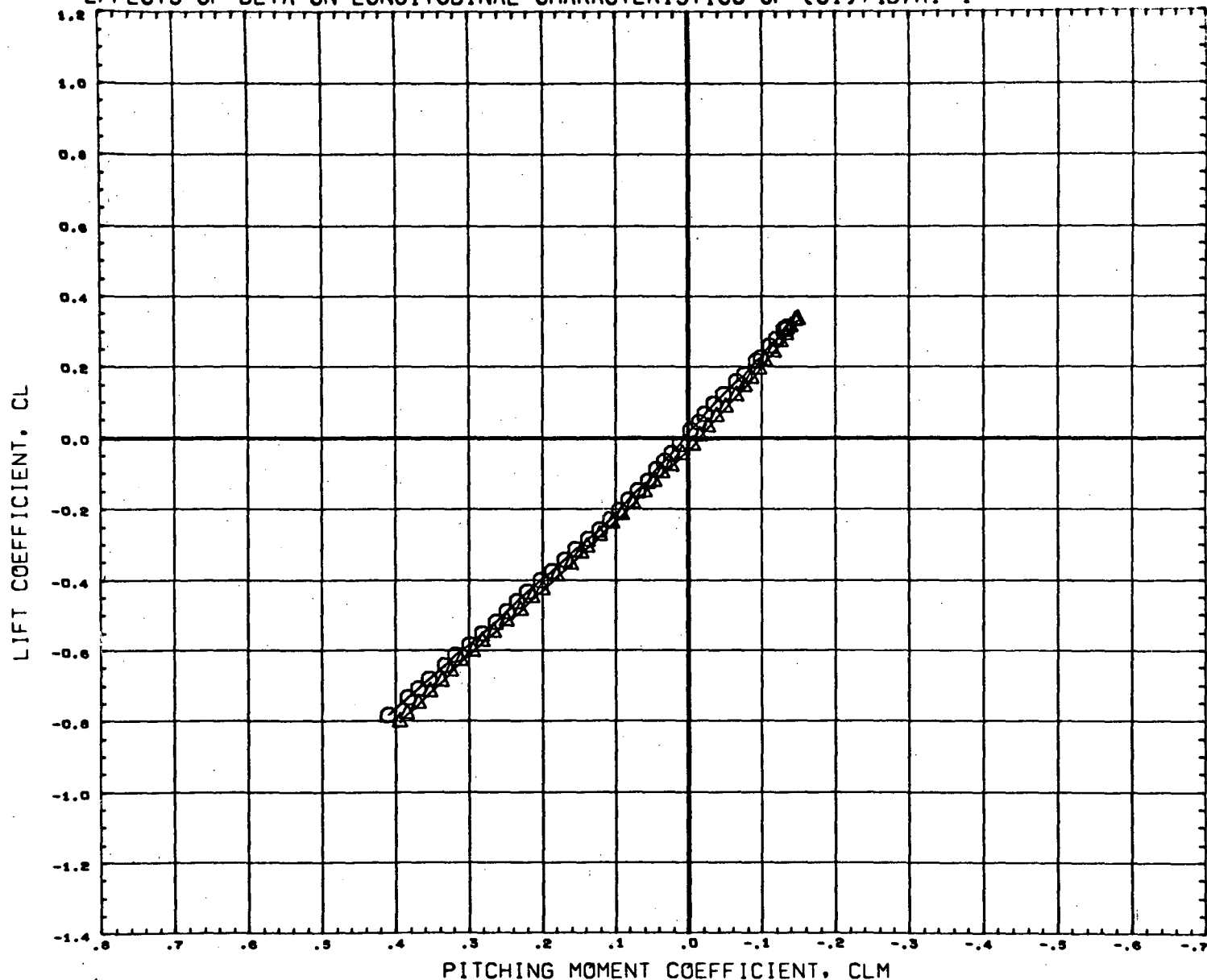


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4

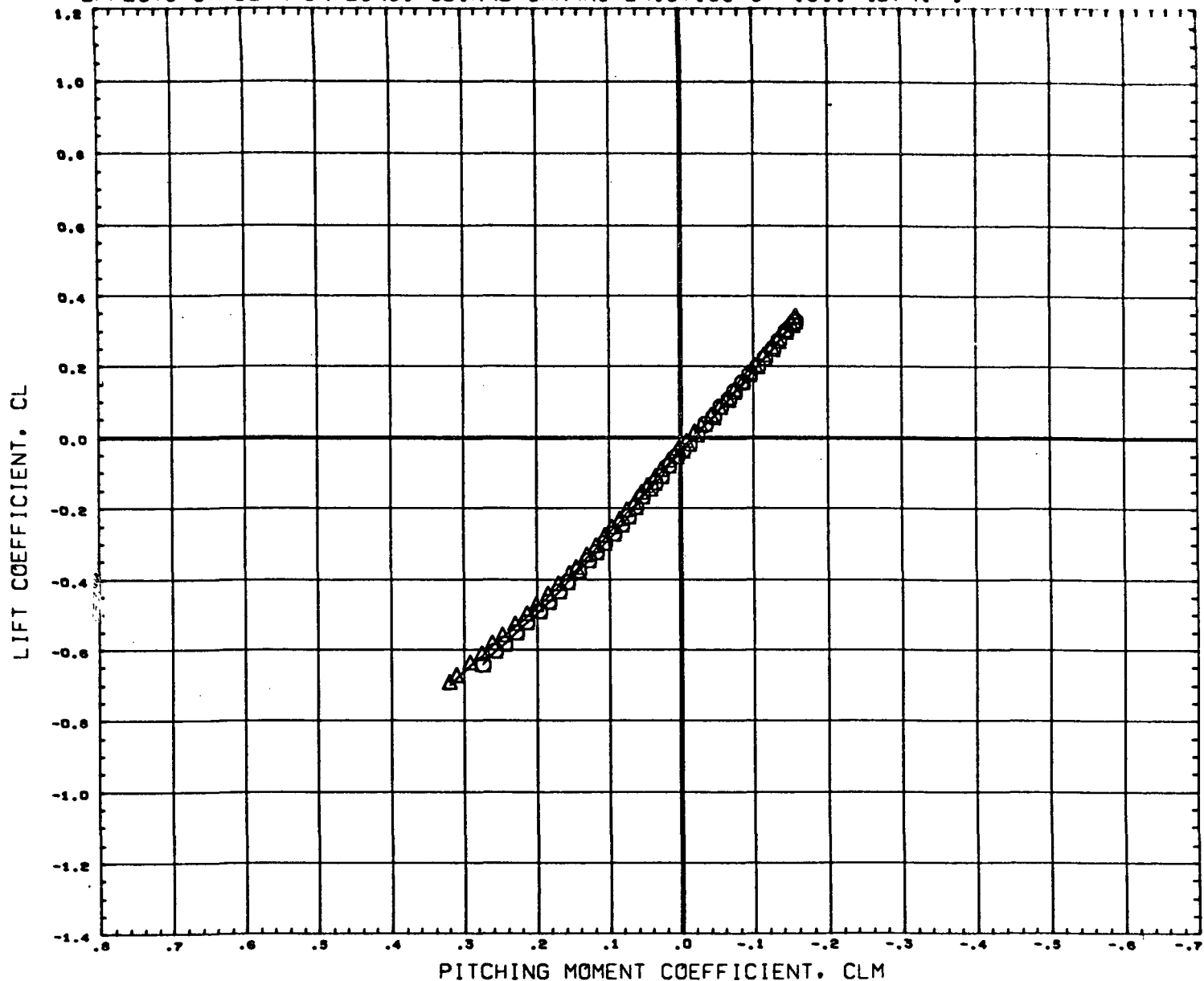


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |



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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7)  MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4
 (CD74C9)  MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

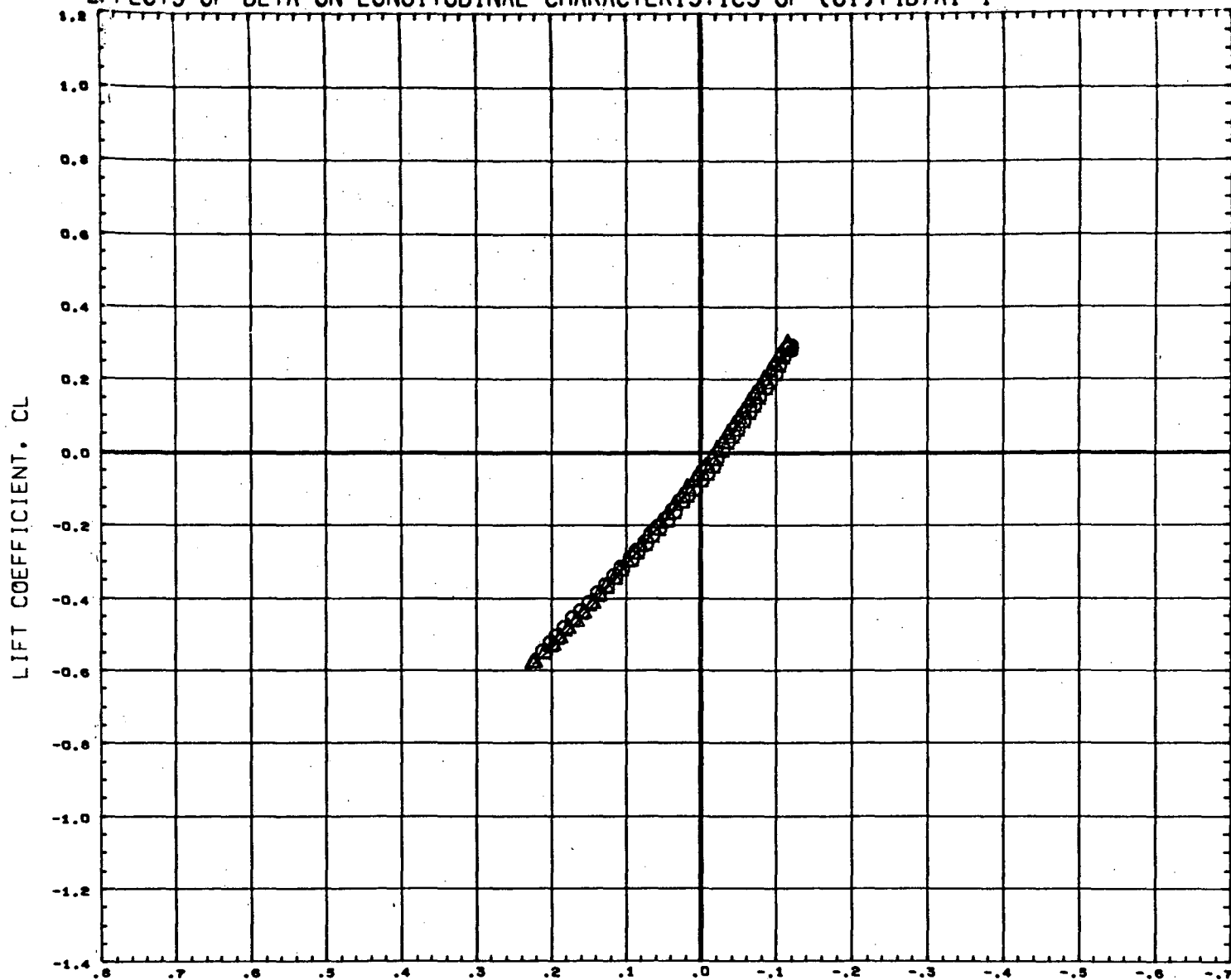
MACH

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4

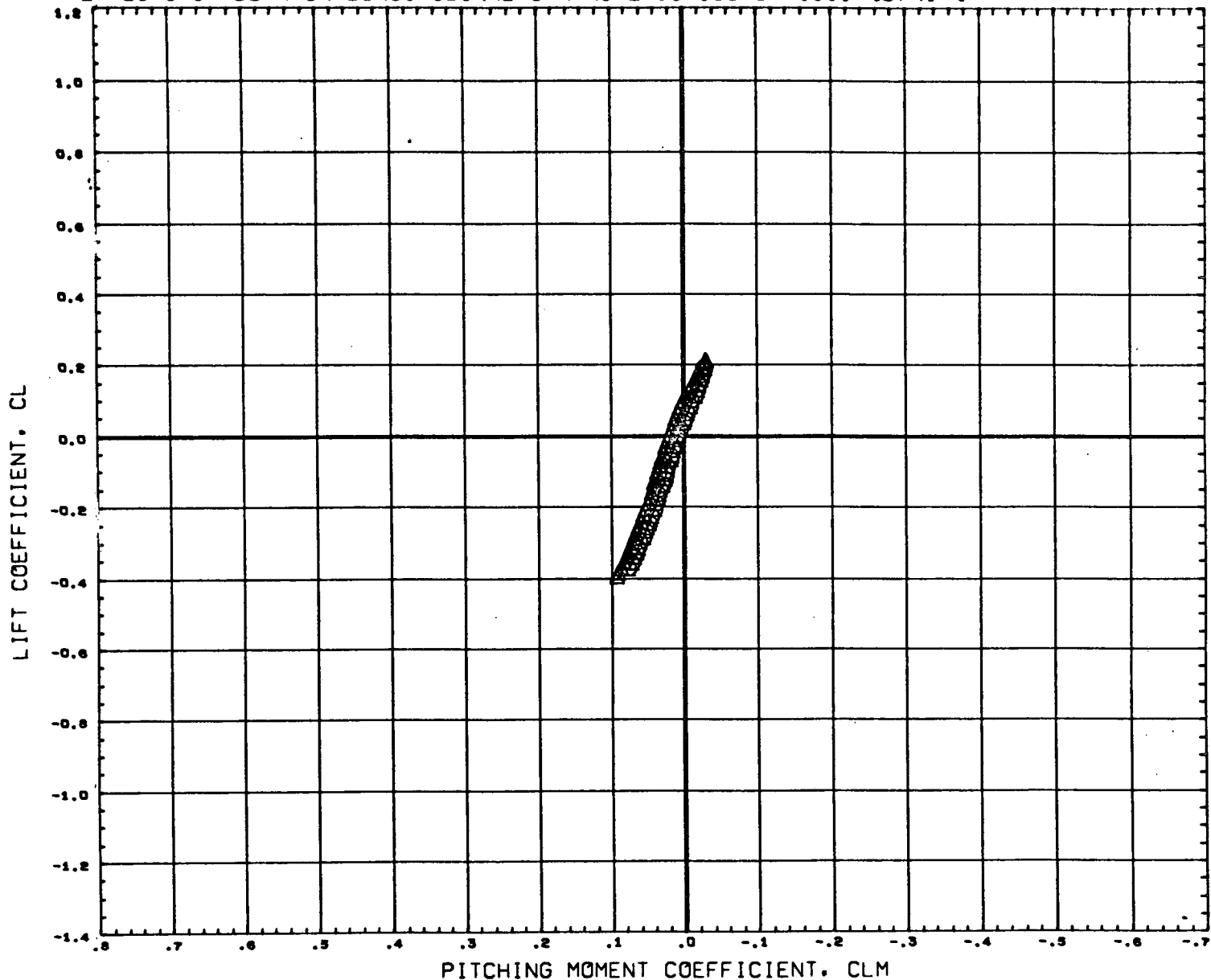


| DATA SET SYMBOL | | CONFIGURATION DESCRIPTION | | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-----------------|---|----------------------------|--------------|-------|--------|--------|--------|-----------------------|-----------|--------|
| (CD74C7) | Q | MDAC S-222 COMPOSITE(T-CG) | (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| (CD74C9) | A | MDAC S-222 COMPOSITE(T-CG) | (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | | | | | BREF | 882.0004 | IN. |
| | | | | | | | | XMRP | 557.0004 | IN. |
| | | | | | | | | YMRP | 0.0000 | IN. |
| | | | | | | | | ZMRP | 200.0004 | IN. |
| | | | | | | | | SCALE | 0.0060 | SCALE |

MACH 2.20

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) Q MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
 (CD74C9) Δ MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

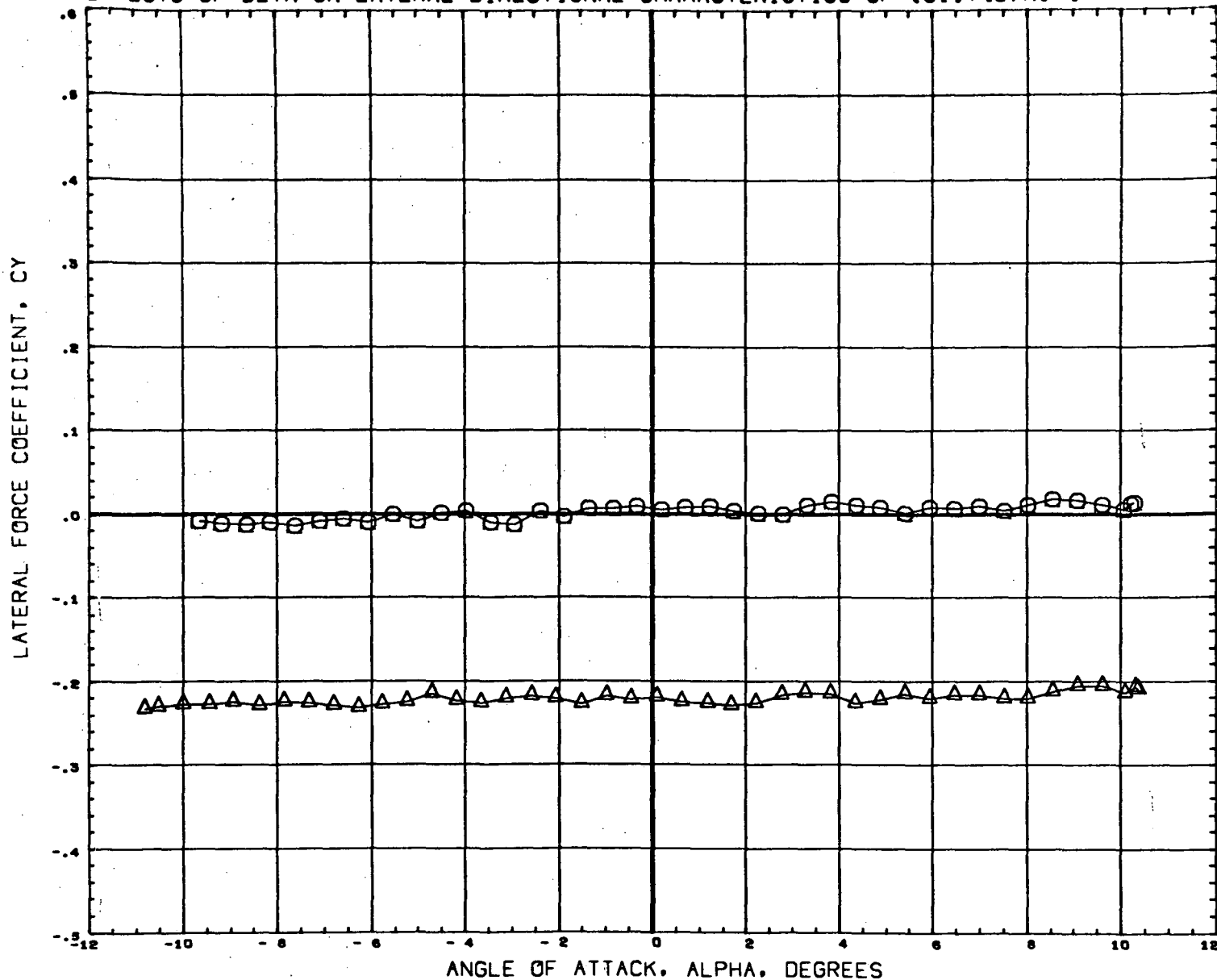
BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 6.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH 4.47

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (01)T4B7A1-4

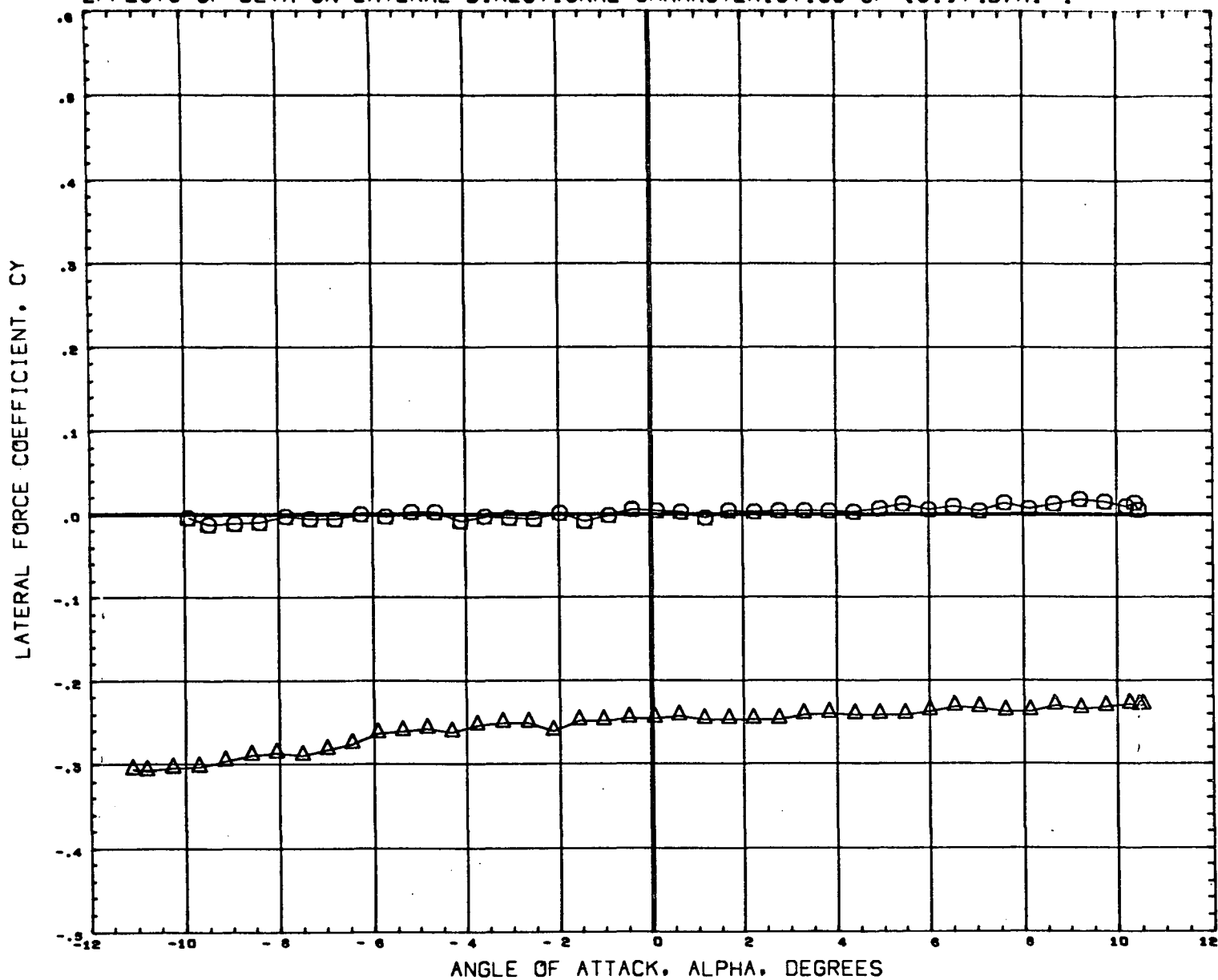


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (O1)T4B7A1-4

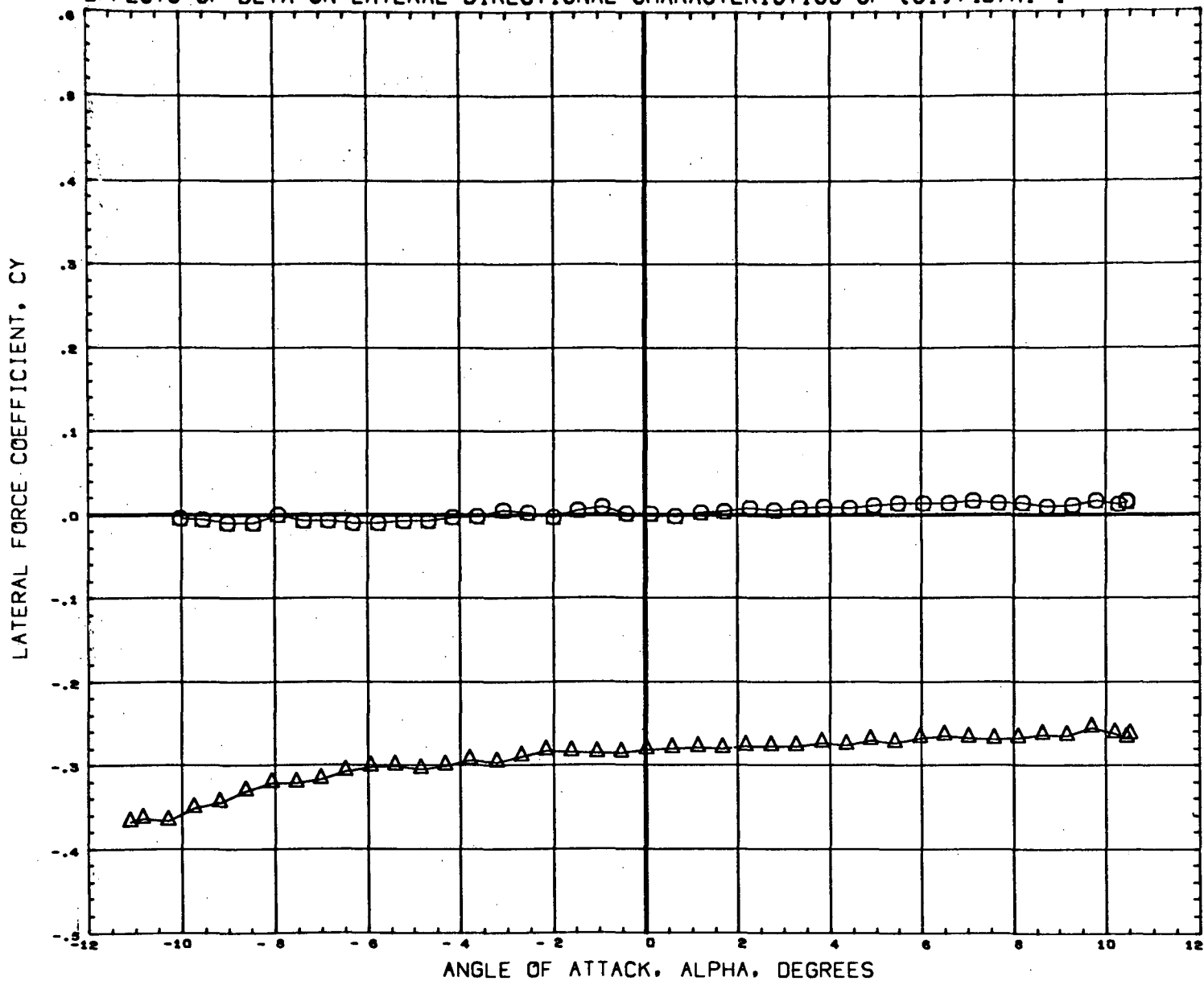




| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74C9) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (O1)T4B7A1-4



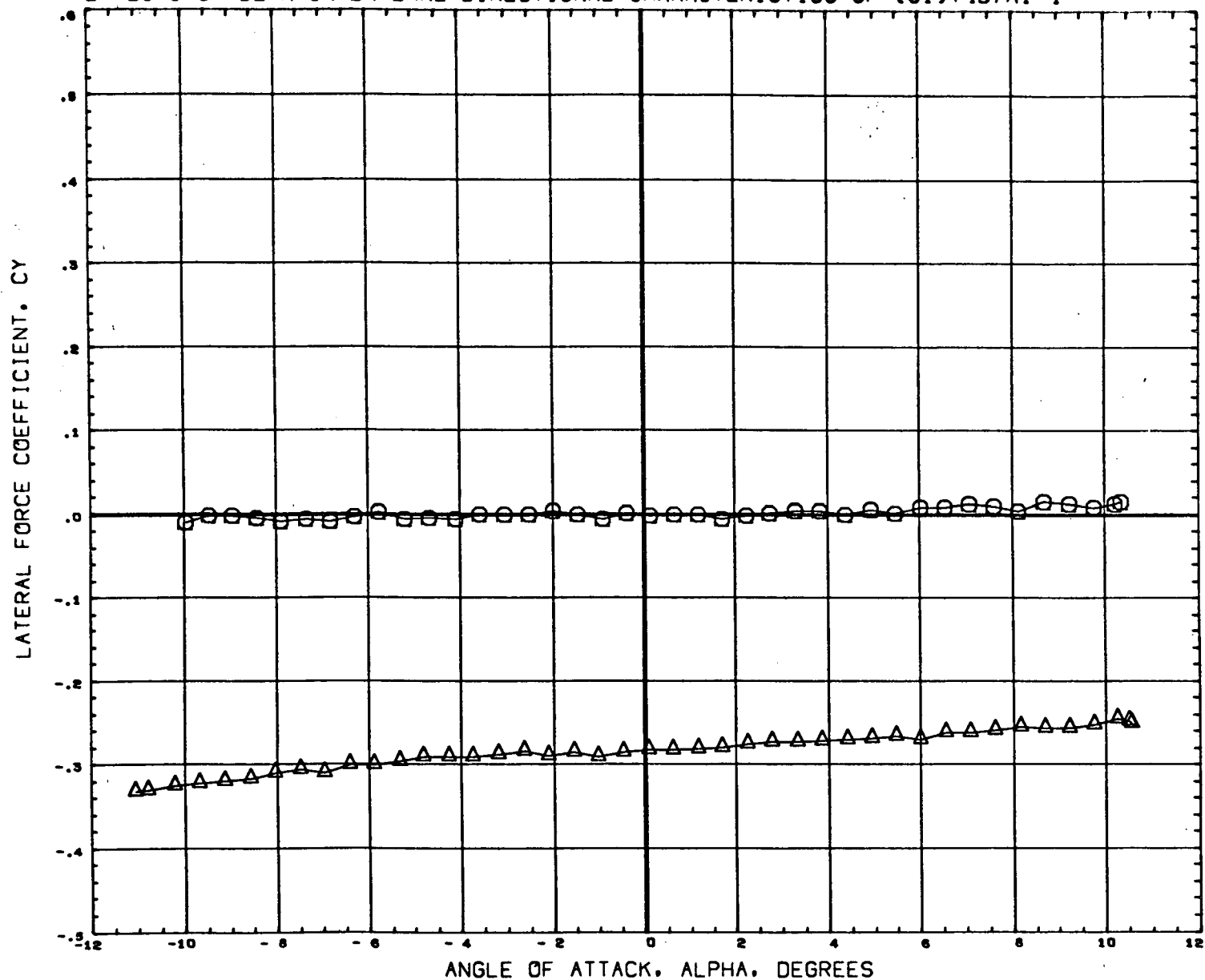
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|--|---|
| (RD74C7)  | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 |
| (RD74Q9)  | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 537.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 1.08

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (01)T4B7A1-4

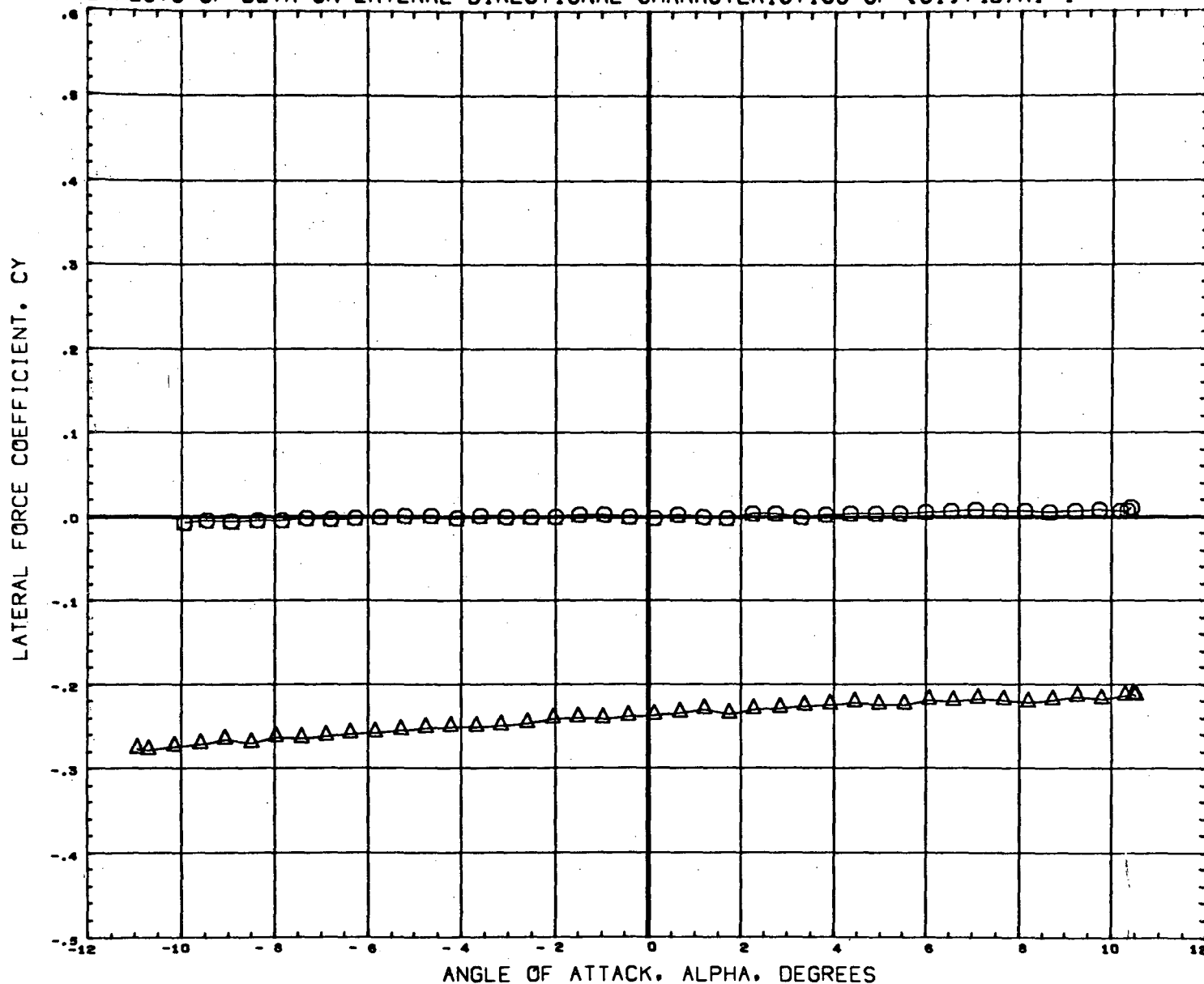


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (O1)T4B7A1-4

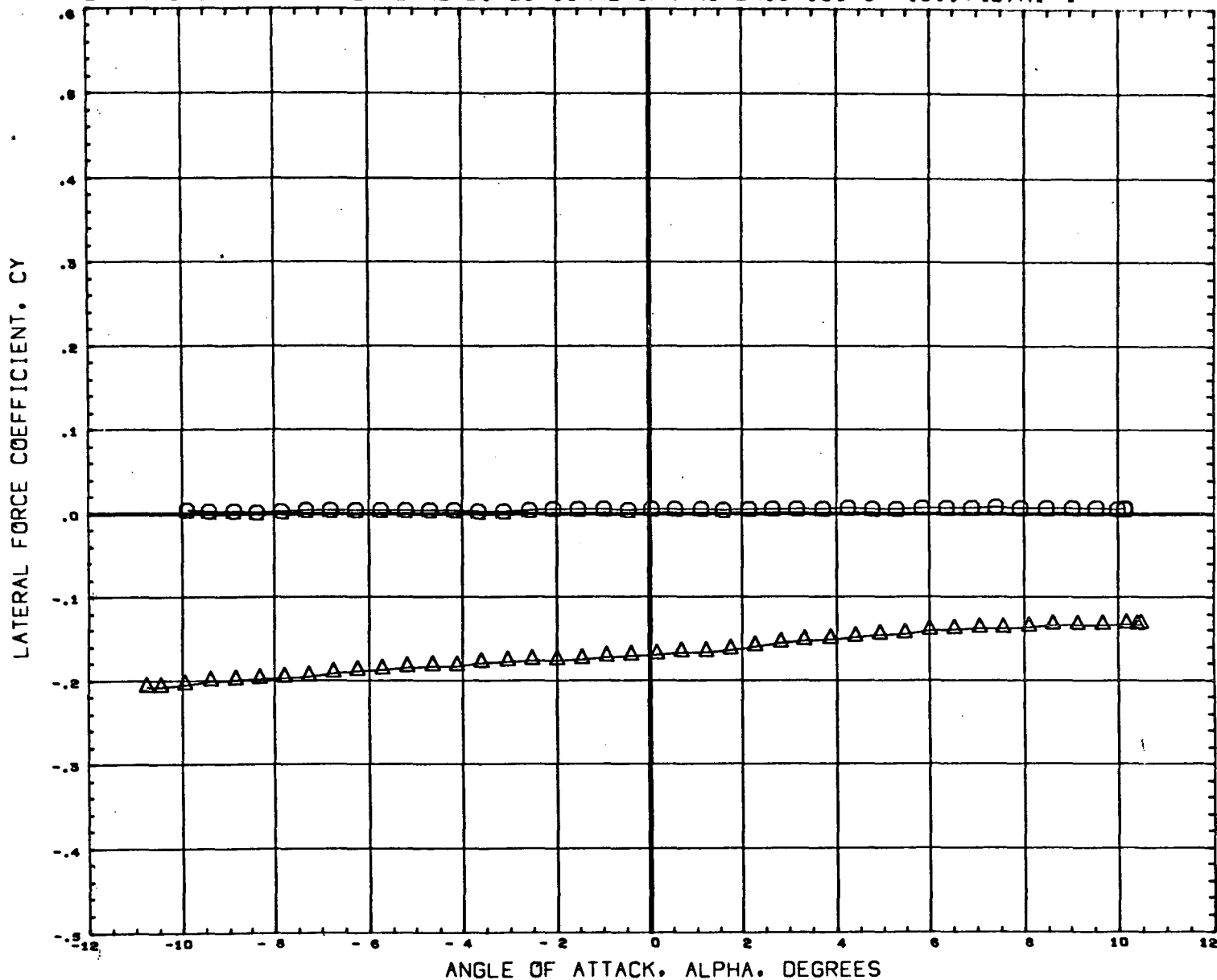


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74C9) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0080 SCALE |

MACH 2.20

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (01)T4B7A1-4



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (RD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (RD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |

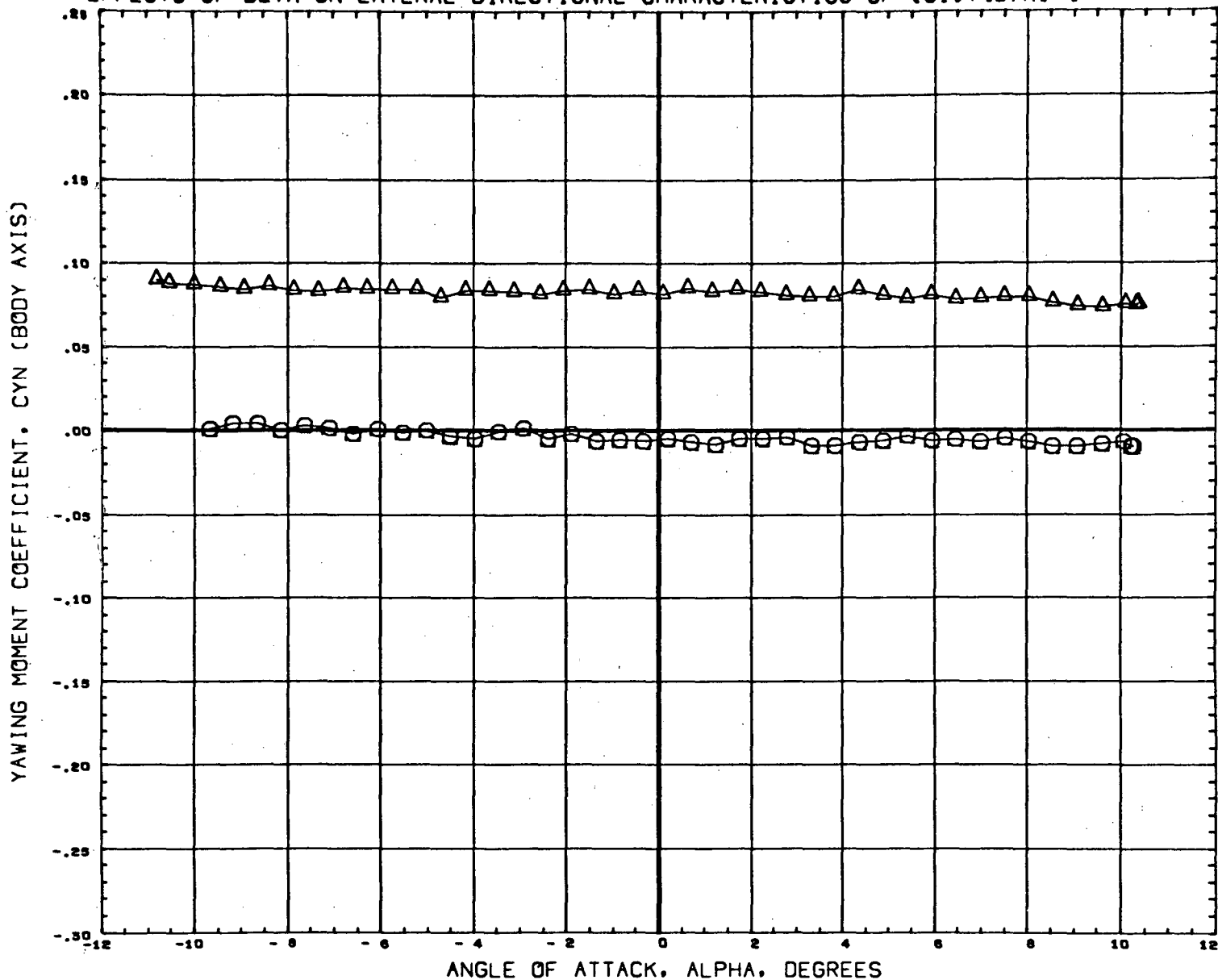
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|---------|
| SREF | 3155.3040 | SQ. FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 4.47

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (01)T4B7A1-4

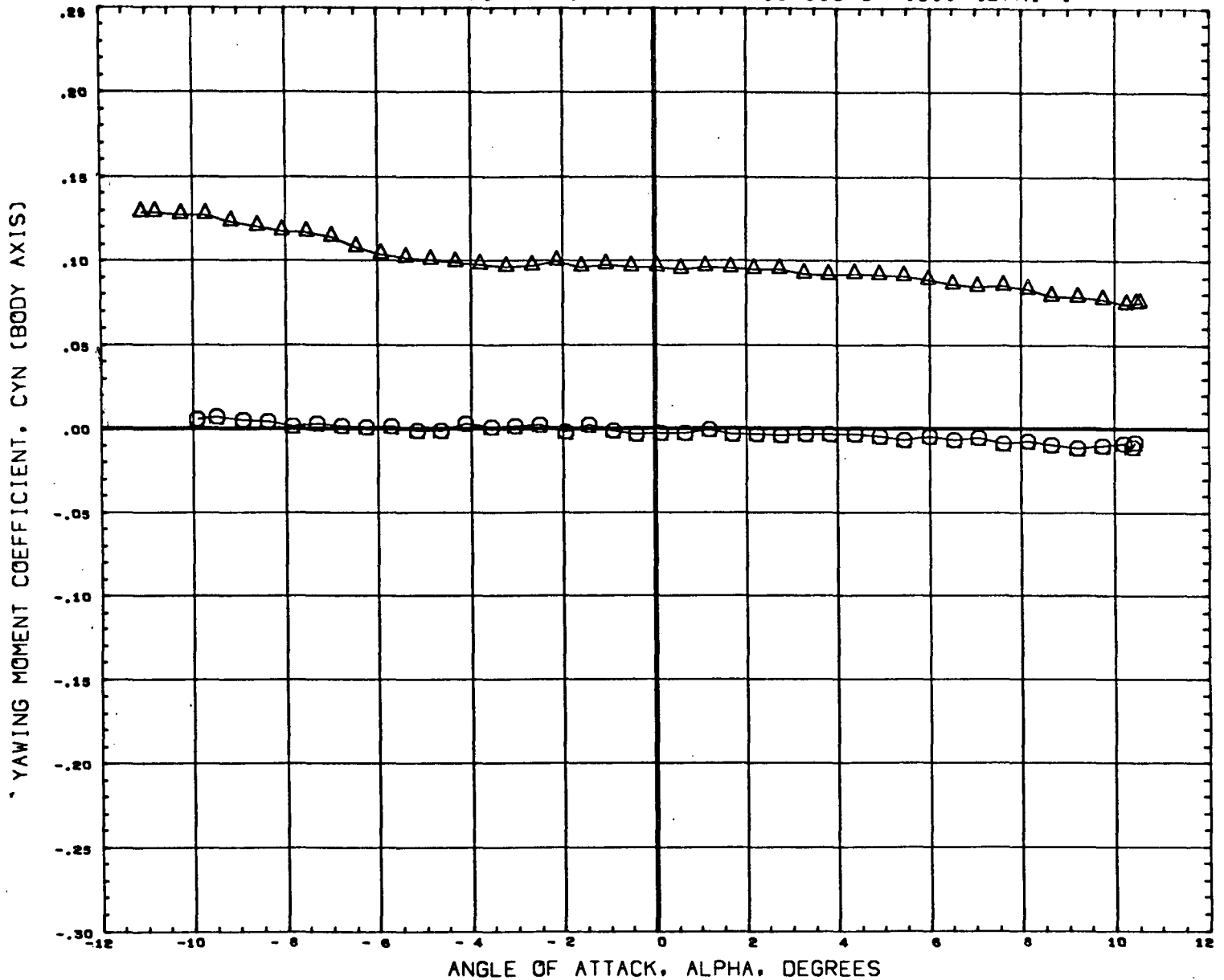


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 662.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (O1)T4B7A1-4

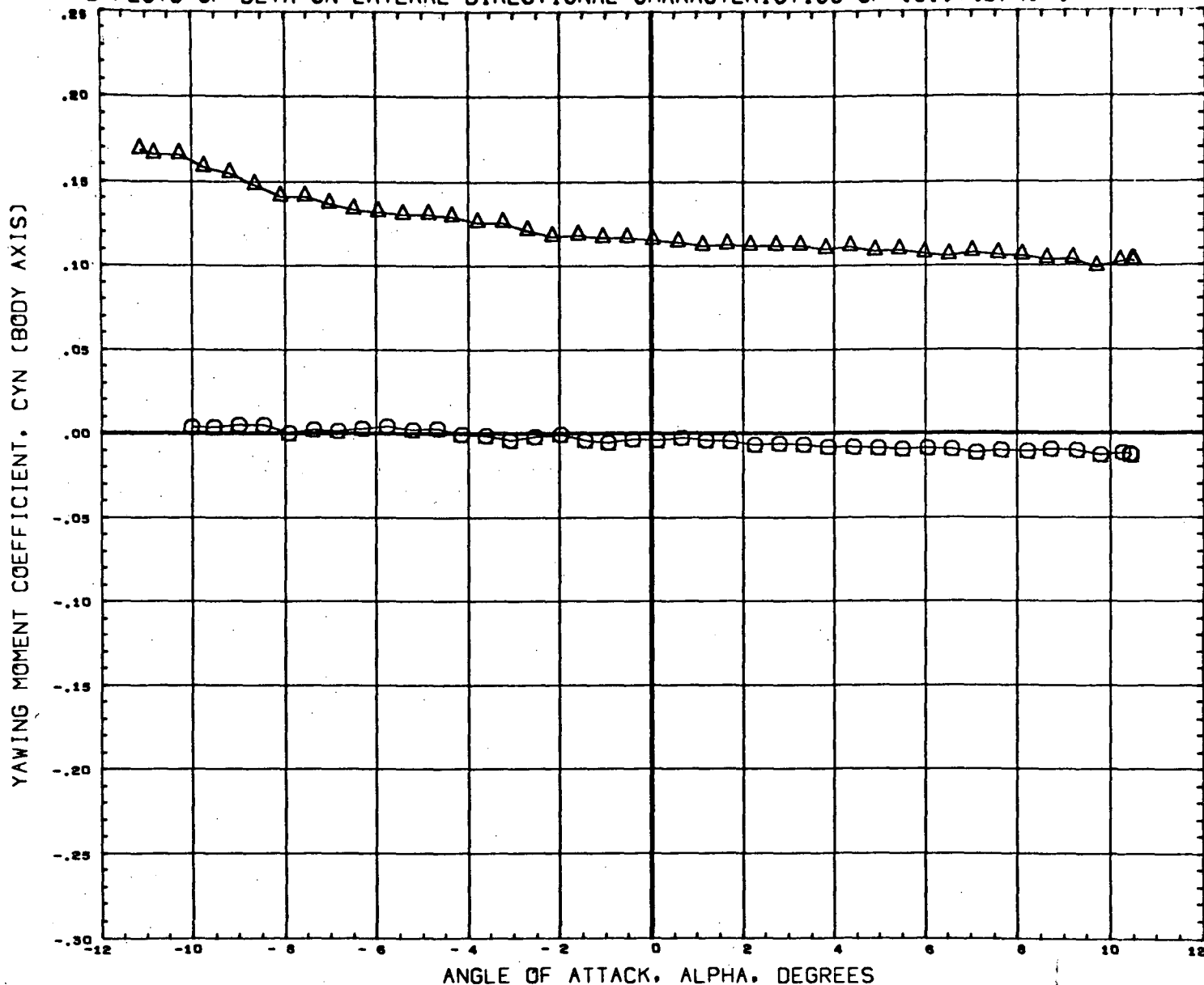


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74C9) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (O1)T4B7A1-4

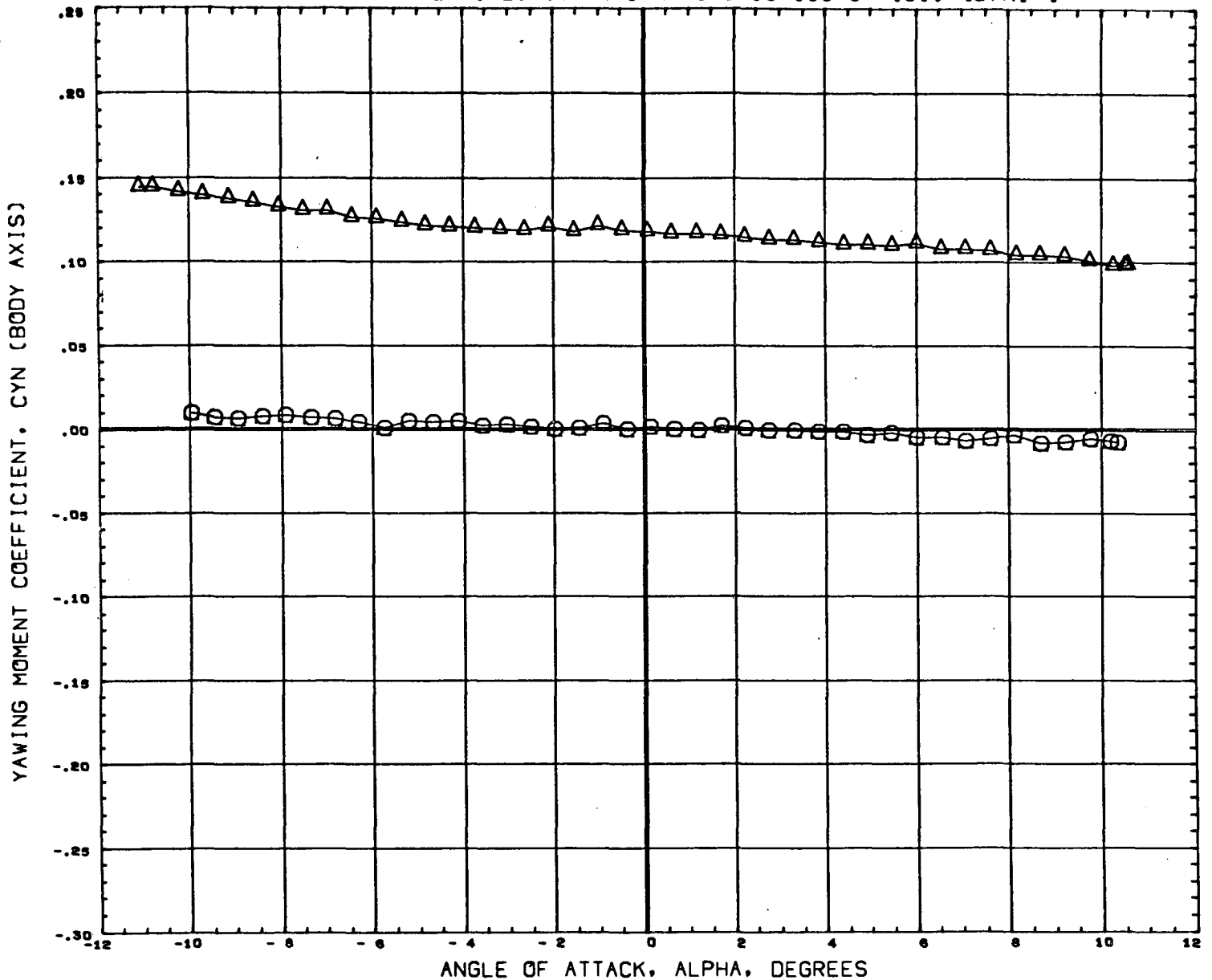


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-----------------|---|-------|--------|--------|--------|-----------------------|-----------|--------|
| (RD74C7) | NDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | sq.ft. |
| (RD74C8) | NDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | | | BREF | 682.0004 | IN. |
| | | | | | | XMRP | 937.0004 | IN. |
| | | | | | | YMRP | 0.0000 | IN. |
| | | | | | | ZMRP | 200.0004 | IN. |
| | | | | | | SCALE | 0.0060 | SCALE |

MACH 1.08

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (O1)T4B7A1-4



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (RD74C7) \bigcirc MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4
 (RD74C9) \triangle MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4

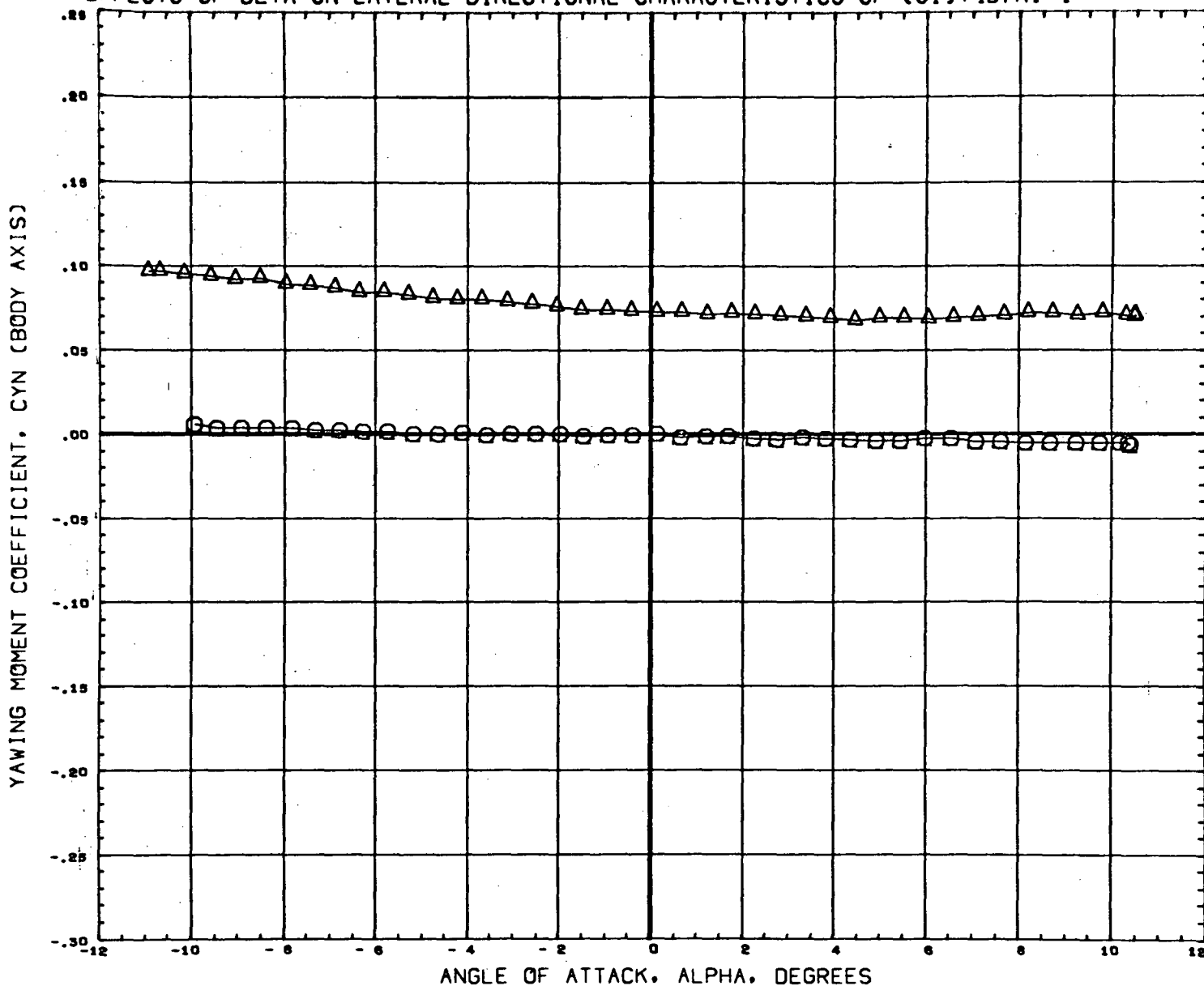
BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 6.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH 1.51

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (01)T4B7A1-4



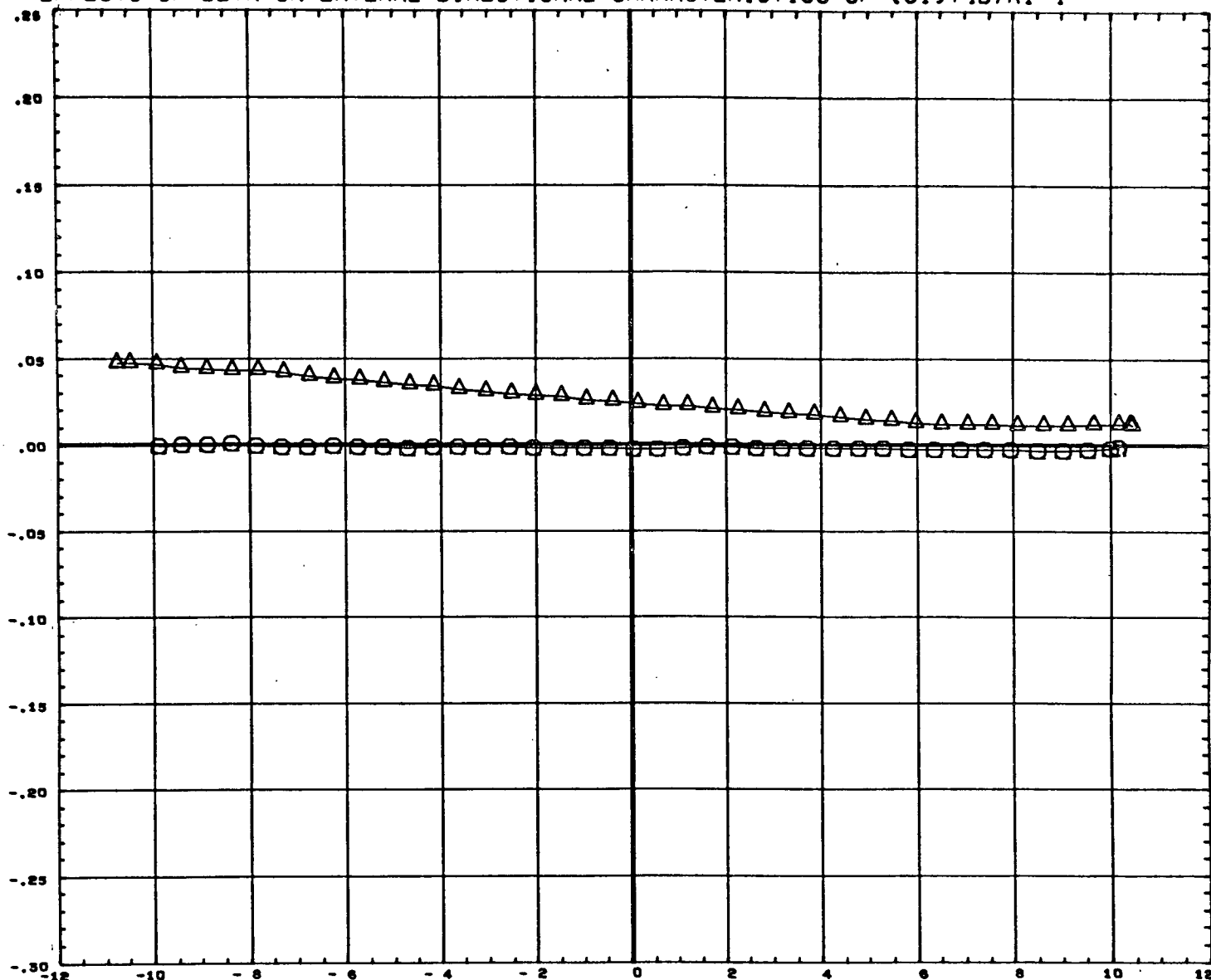
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (01)T4B7A1-4

YAWING MOMENT COEFFICIENT, CYN (BODY AXIS)



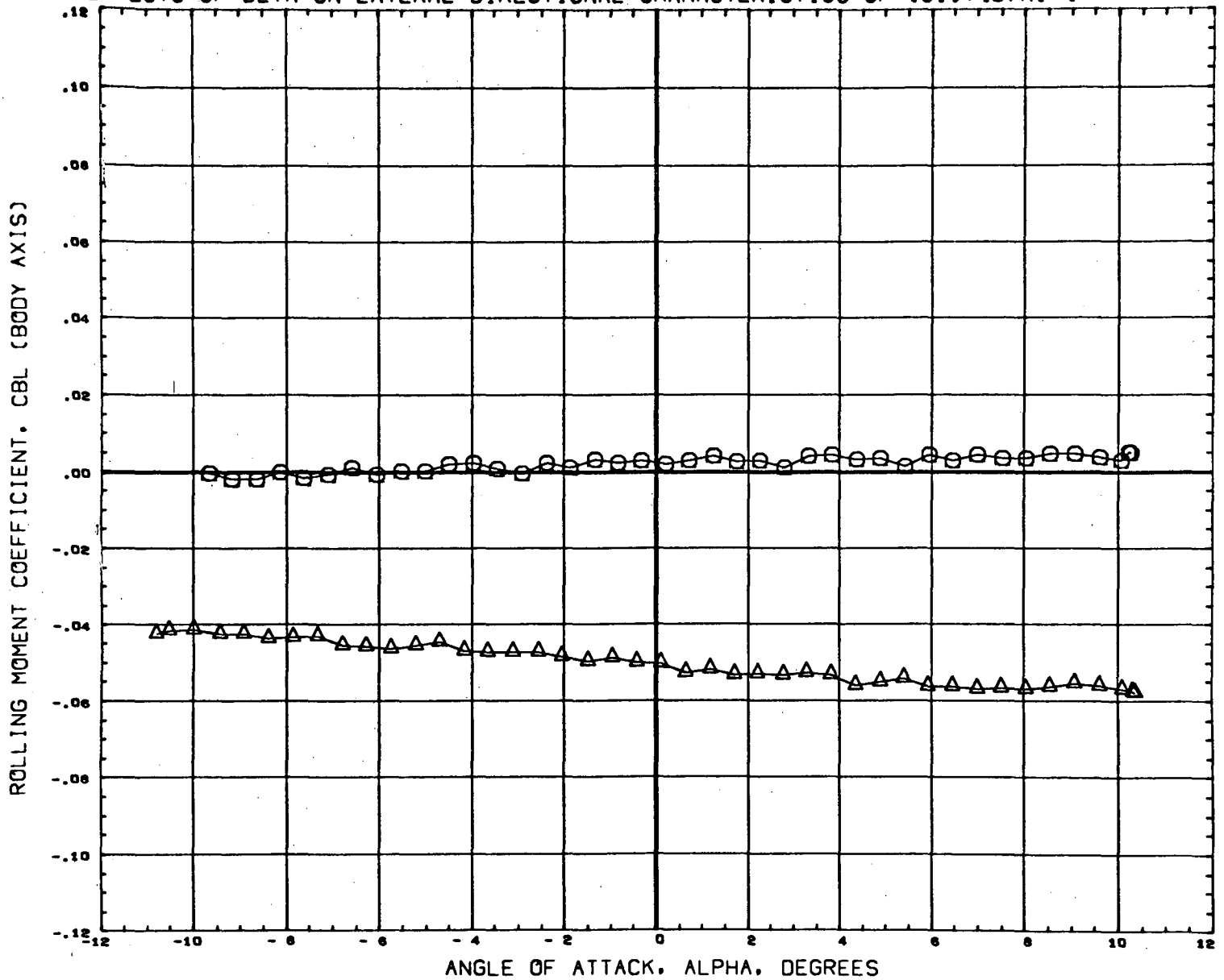
DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (R074C7) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
 (R074C9) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 4.47

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (01)T4B7A1-4



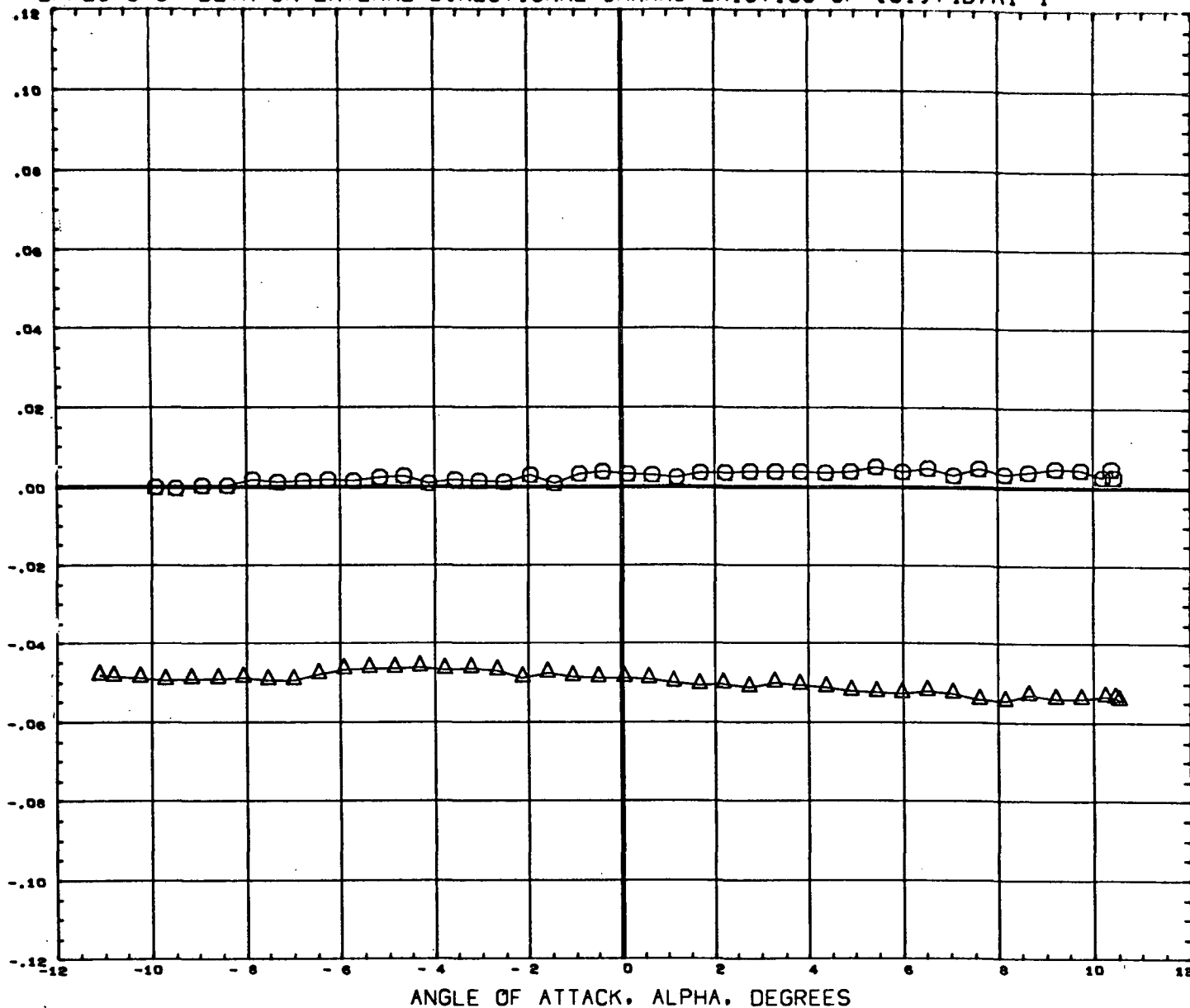
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (O1)T4B7A1-4

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(RD74C7) (O) MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4
 (RD74C9) (X) MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4

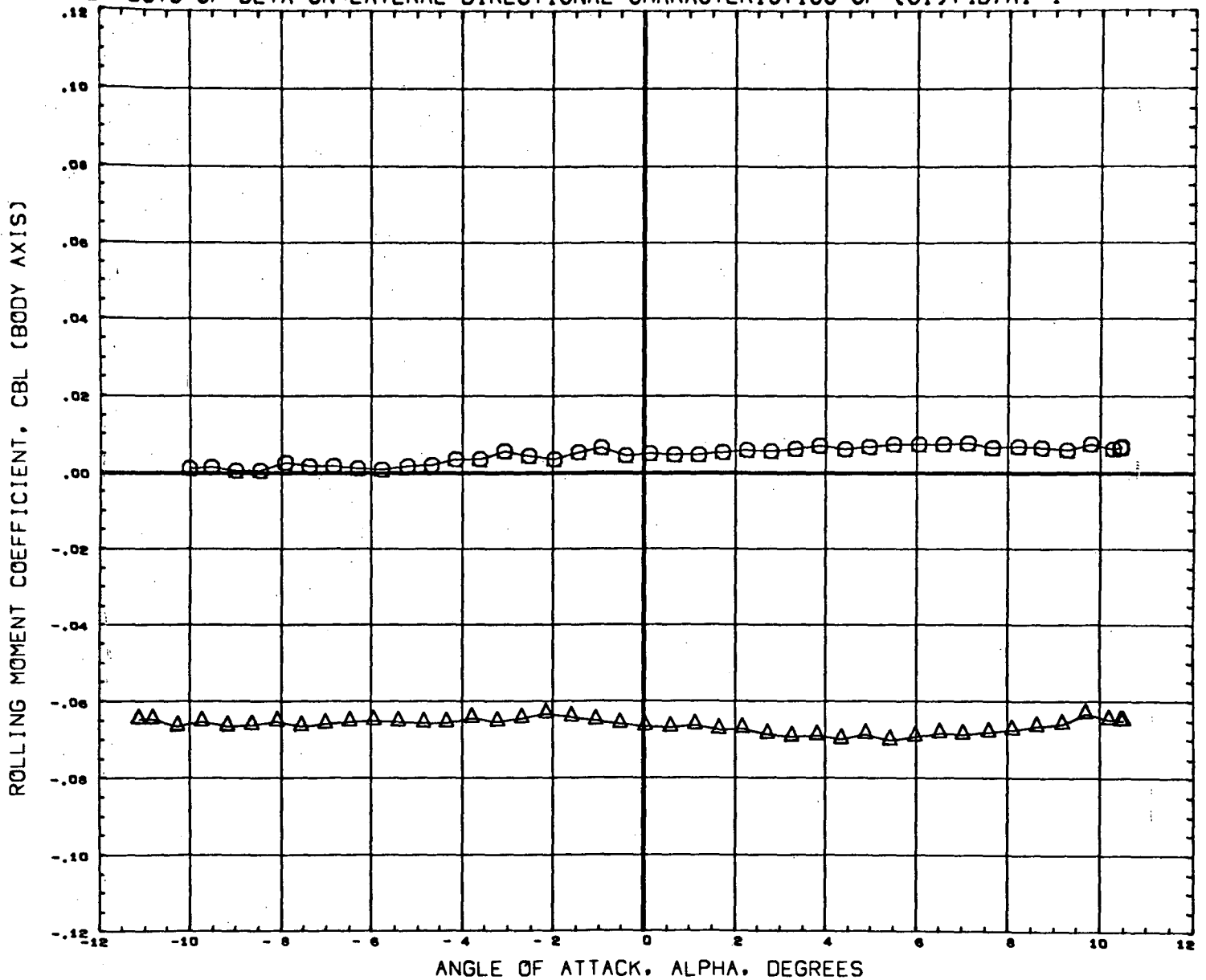
BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 6.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH .90

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (01)T4B7A1-4

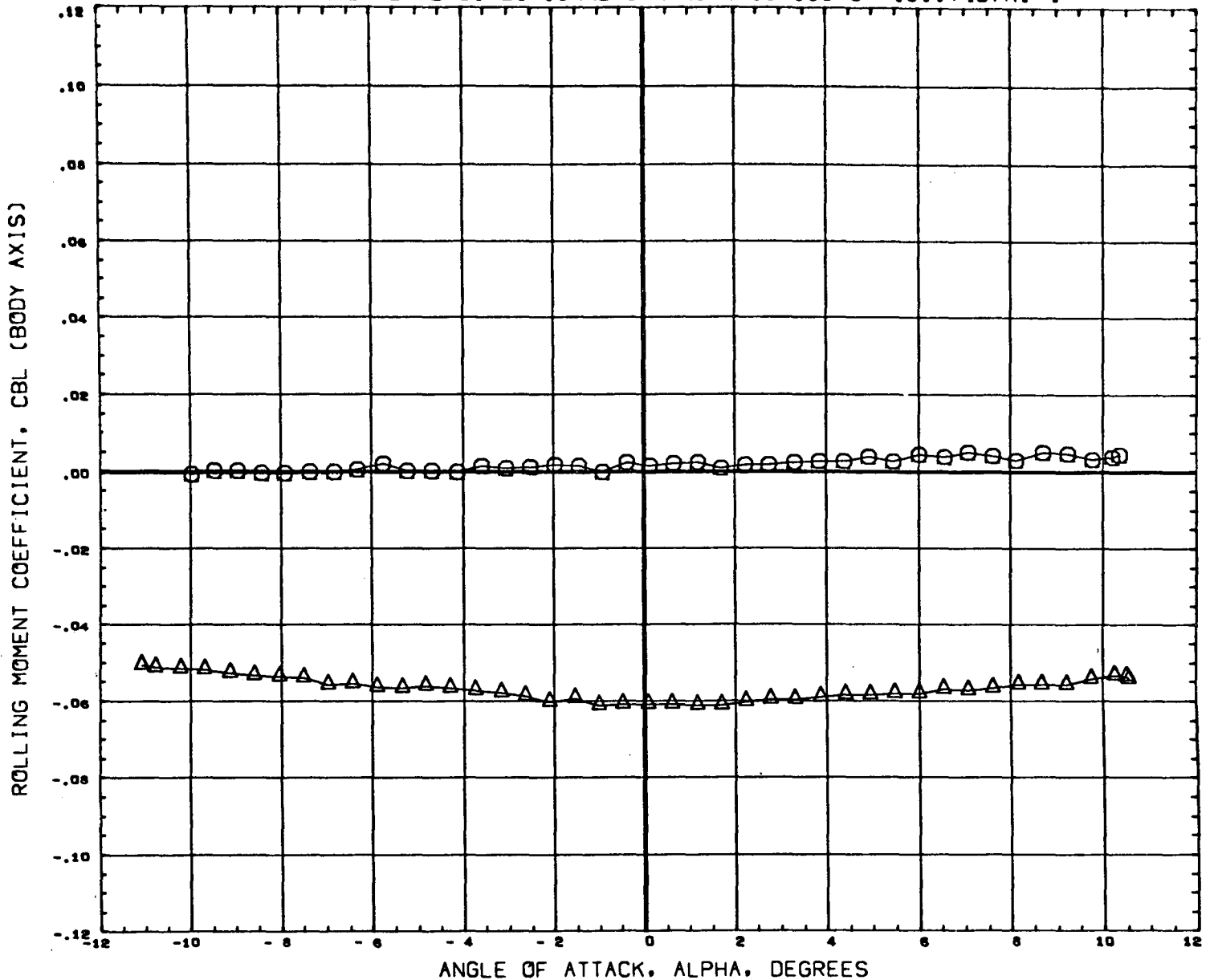


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 997.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (O1)T4B7A1-4

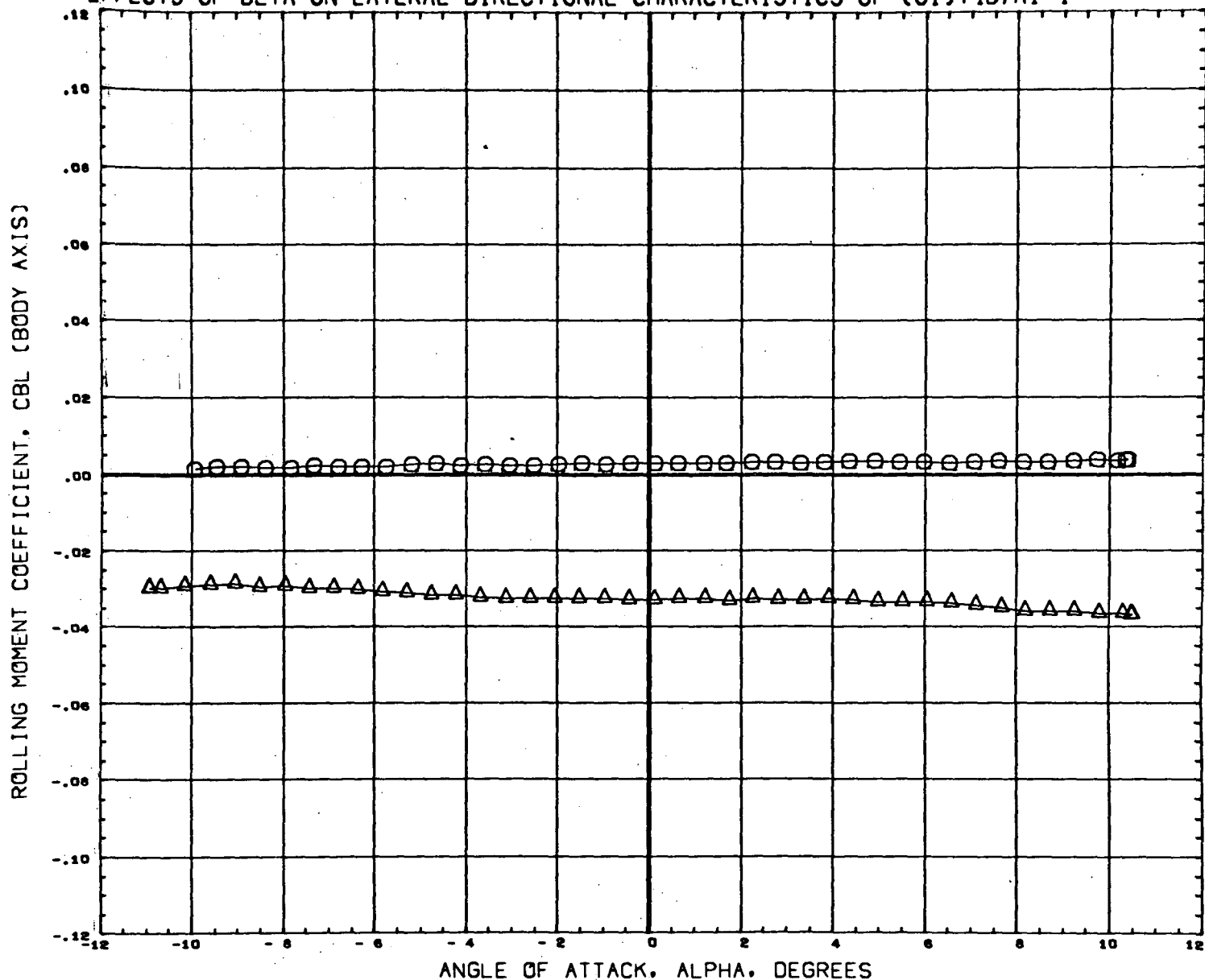


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74C9) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.51

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (01)T4B7A1-4



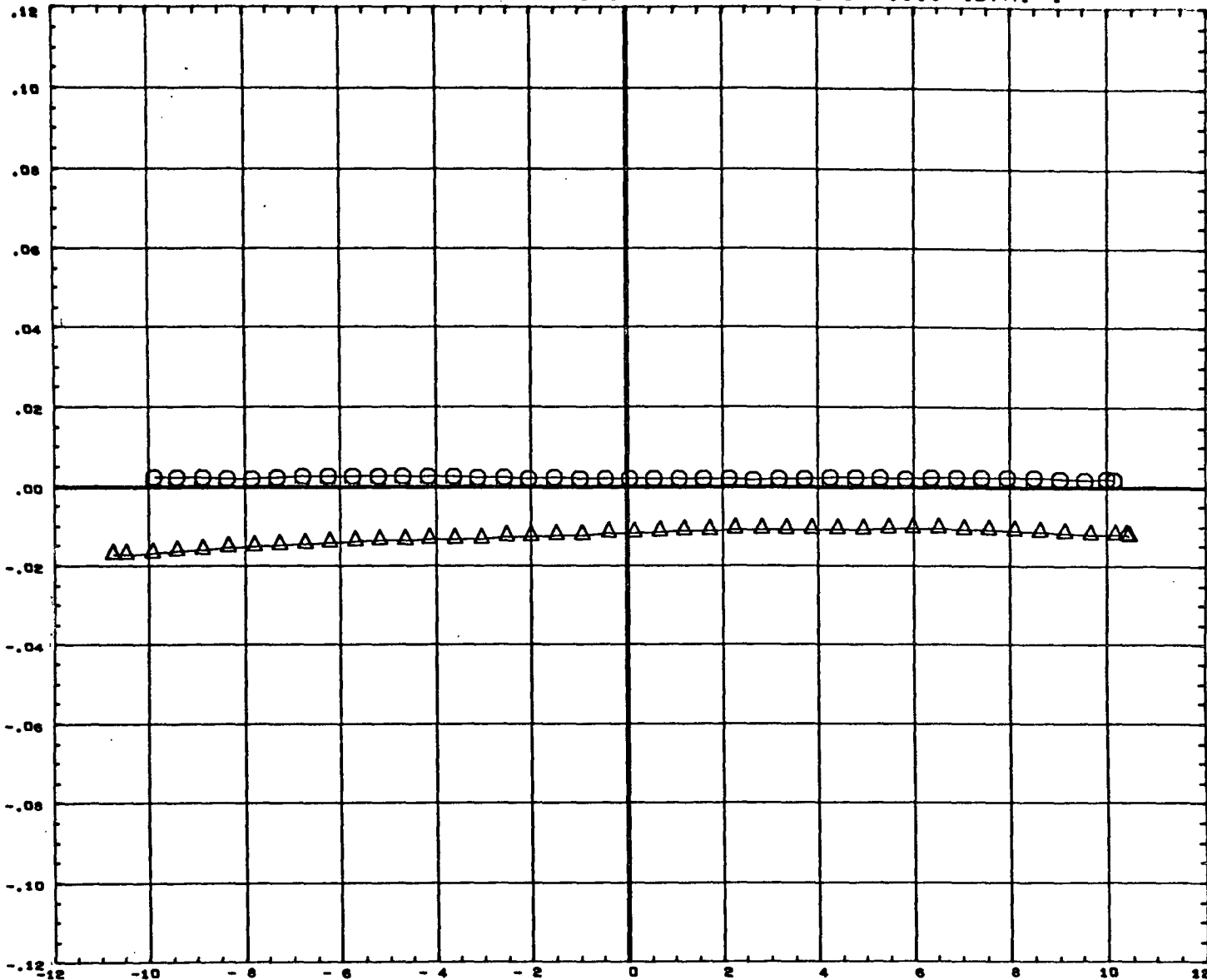
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 957.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (01)T4B7A1-4

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



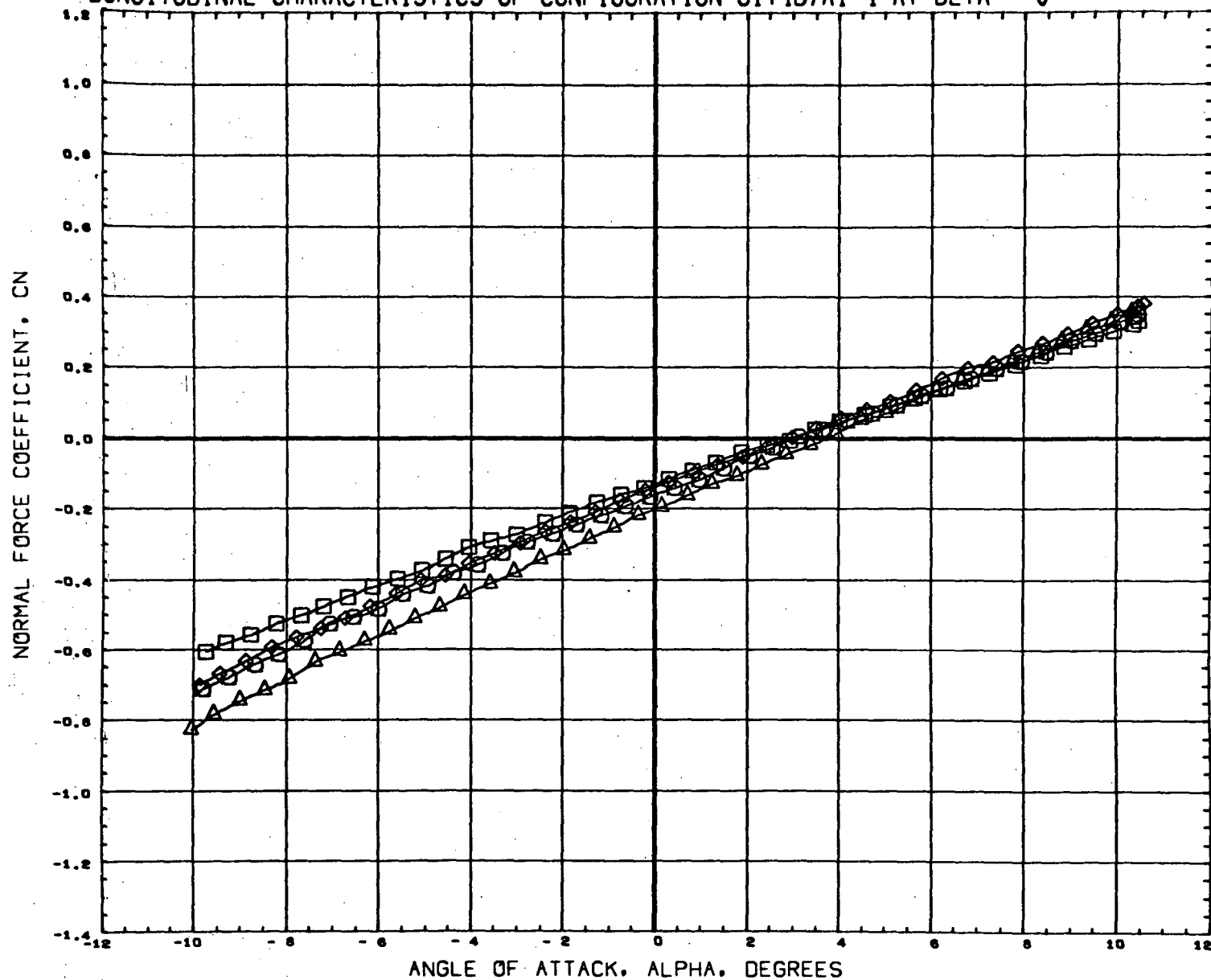
ANGLE OF ATTACK, ALPHA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C71) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | YMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

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LONGITUDINAL CHARACTERISTICS OF CONFIGURATION 01T4B7A1-4 AT BETA = 0

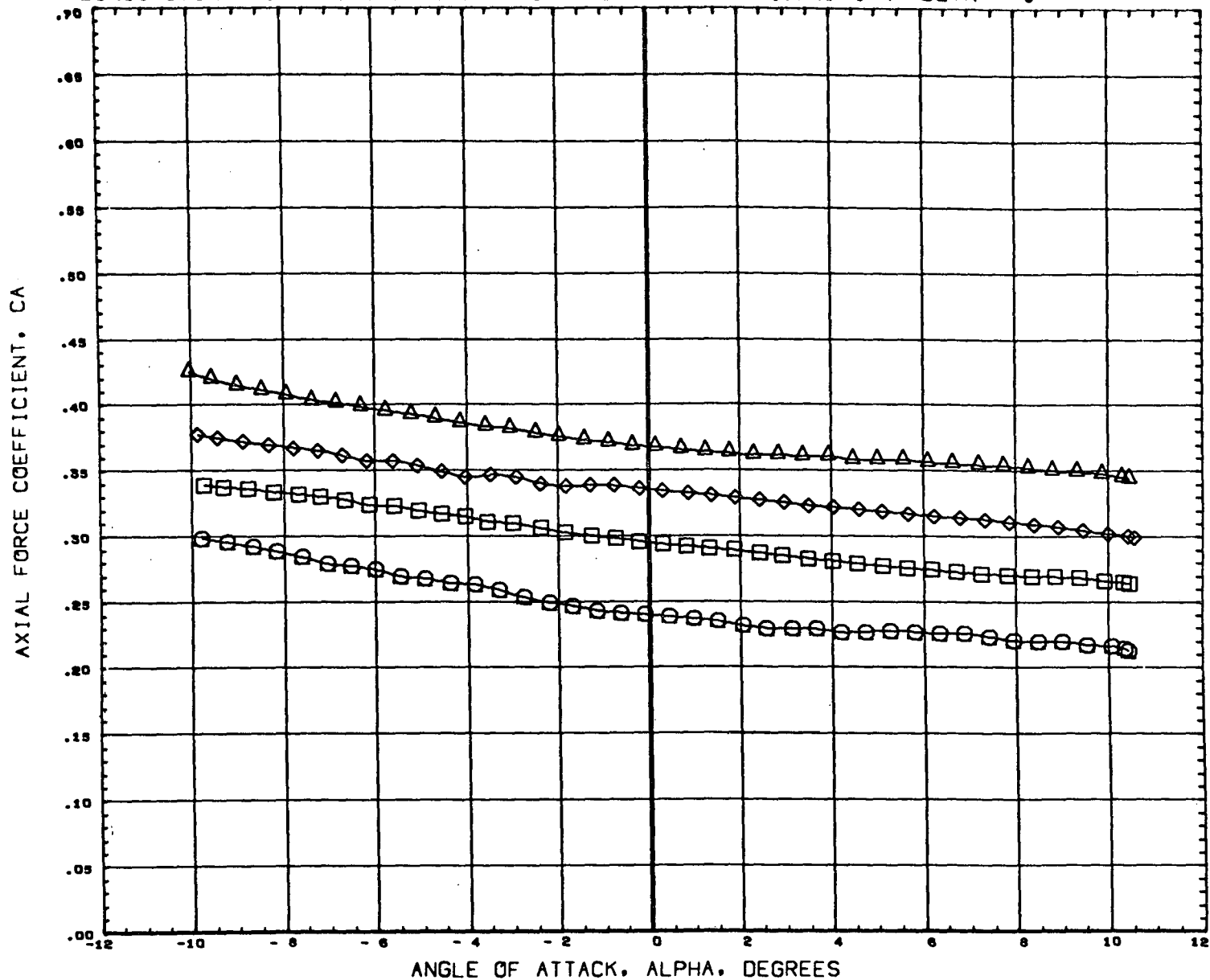


| SYMBOL | MACH | PARAMETRIC VALUES | | | |
|--------|-------|-------------------|-------|--------|-------|
| ○ | 0.901 | BETA | 0.000 | AILRON | 0.000 |
| △ | 1.093 | ELEVTR | 0.000 | RUDDER | 0.000 |
| ◇ | 1.507 | | | | |
| □ | 2.203 | | | | |

DATA HIST. CODE TV

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XM RP | 557.0004 | IN. |
| YM RP | 0.0000 | IN. |
| ZM RP | 200.0004 | IN. |
| SCALE | 0.0060 | |

LONGITUDINAL CHARACTERISTICS OF CONFIGURATION 01T4B7A1-4 AT BETA = 0

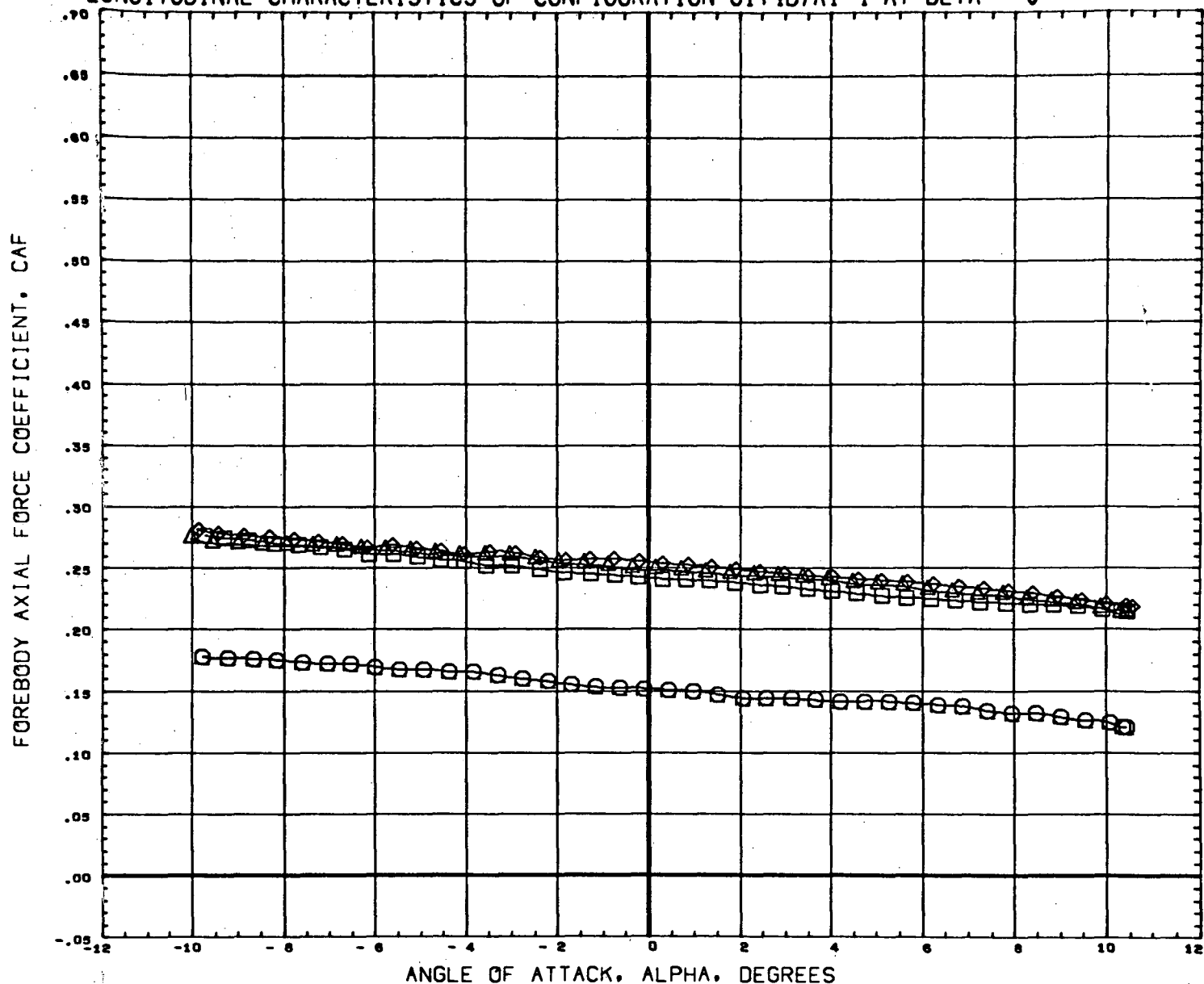


| SYMBOL | MACH | PARAMETRIC VALUES | | | |
|--------|-------|-------------------|-------|--------|-------|
| ○ | 0.901 | BETA | 0.000 | AILRON | 0.000 |
| △ | 1.093 | ELEVTR | 0.000 | RUDDER | 0.000 |
| ◇ | 1.507 | | | | |
| □ | 2.203 | | | | |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 537.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

DATA HIST. CODE TV

LONGITUDINAL CHARACTERISTICS OF CONFIGURATION 01T4B7A1-4 AT BETA = 0

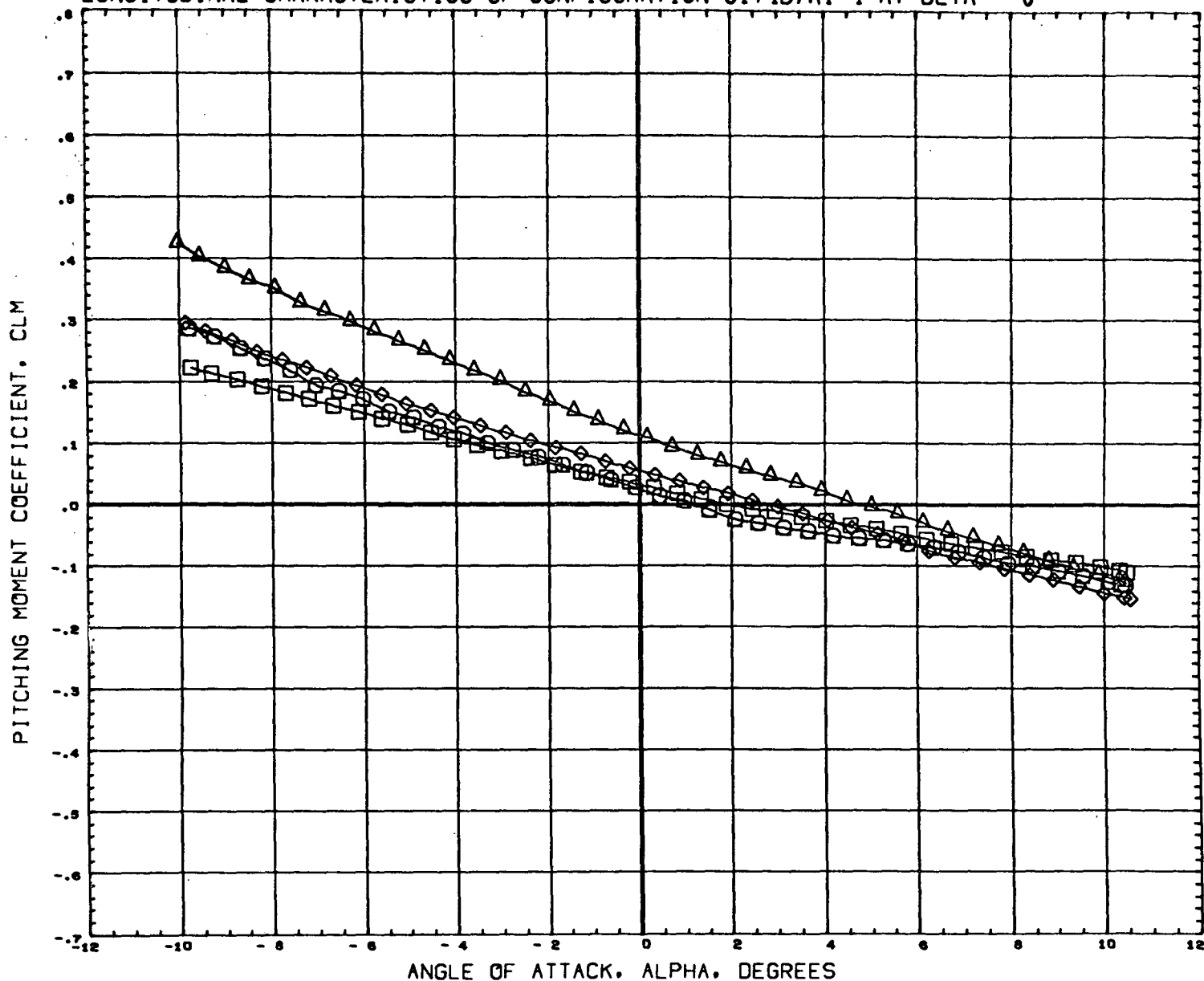


| SYMBOL | MACH | PARAMETRIC VALUES | | | |
|--------|-------|-------------------|-------|--------|-------|
| ○ | 0.901 | BETA | 0.000 | AILRON | 0.000 |
| △ | 1.093 | ELEVTR | 0.000 | RUDDER | 0.000 |
| ◇ | 1.507 | | | | |
| □ | 2.203 | | | | |

DATA HIST. CODE TV

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

LONGITUDINAL CHARACTERISTICS OF CONFIGURATION 01T4B7A1-4 AT BETA = 0

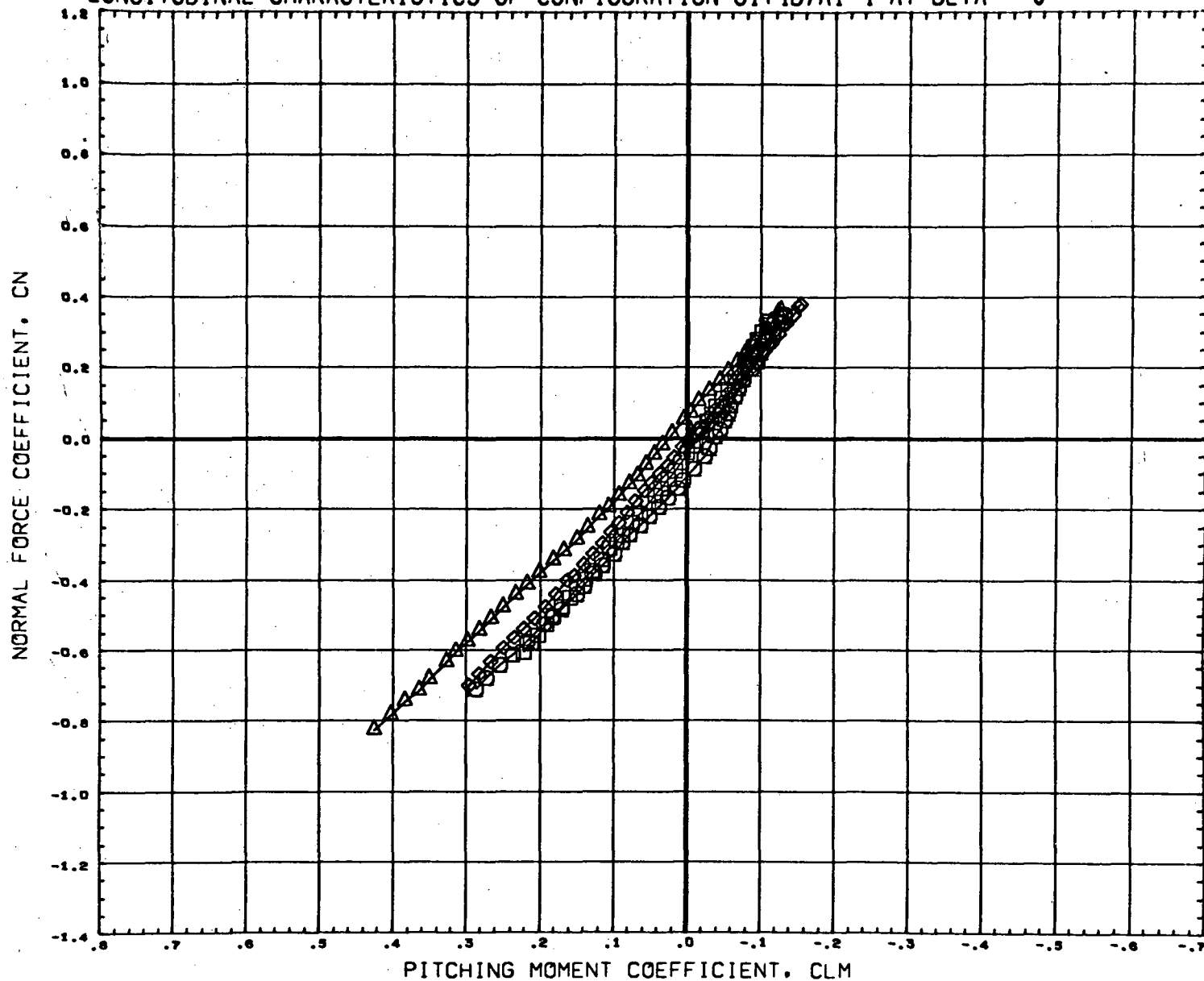


| SYMBOL | MACH | BETA | ELEVTR | PARAMETRIC VALUES | AILRON | RUDDER |
|--------|-------|-------|--------|-------------------|--------|--------|
| ○ | 0.901 | 0.000 | 0.000 | AILRON | 0.000 | 0.000 |
| △ | 1.093 | 0.000 | 0.000 | RUDDER | 0.000 | 0.000 |
| ◇ | 1.507 | | | | | |
| □ | 2.203 | | | | | |

DATA HIST. CODE TV

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 957.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

LONGITUDINAL CHARACTERISTICS OF CONFIGURATION 01T4B7A1-4 AT BETA = 0



| SYMBOL | MACH | PARAMETRIC VALUES | | | |
|--------|-------|-------------------|-------|--------|-------|
| ○ | 0.901 | BETA | 0.000 | AILRON | 0.000 |
| △ | 1.093 | ELEVTR | 0.000 | RUDDER | 0.000 |
| ◇ | 1.507 | | | | |
| □ | 2.203 | | | | |

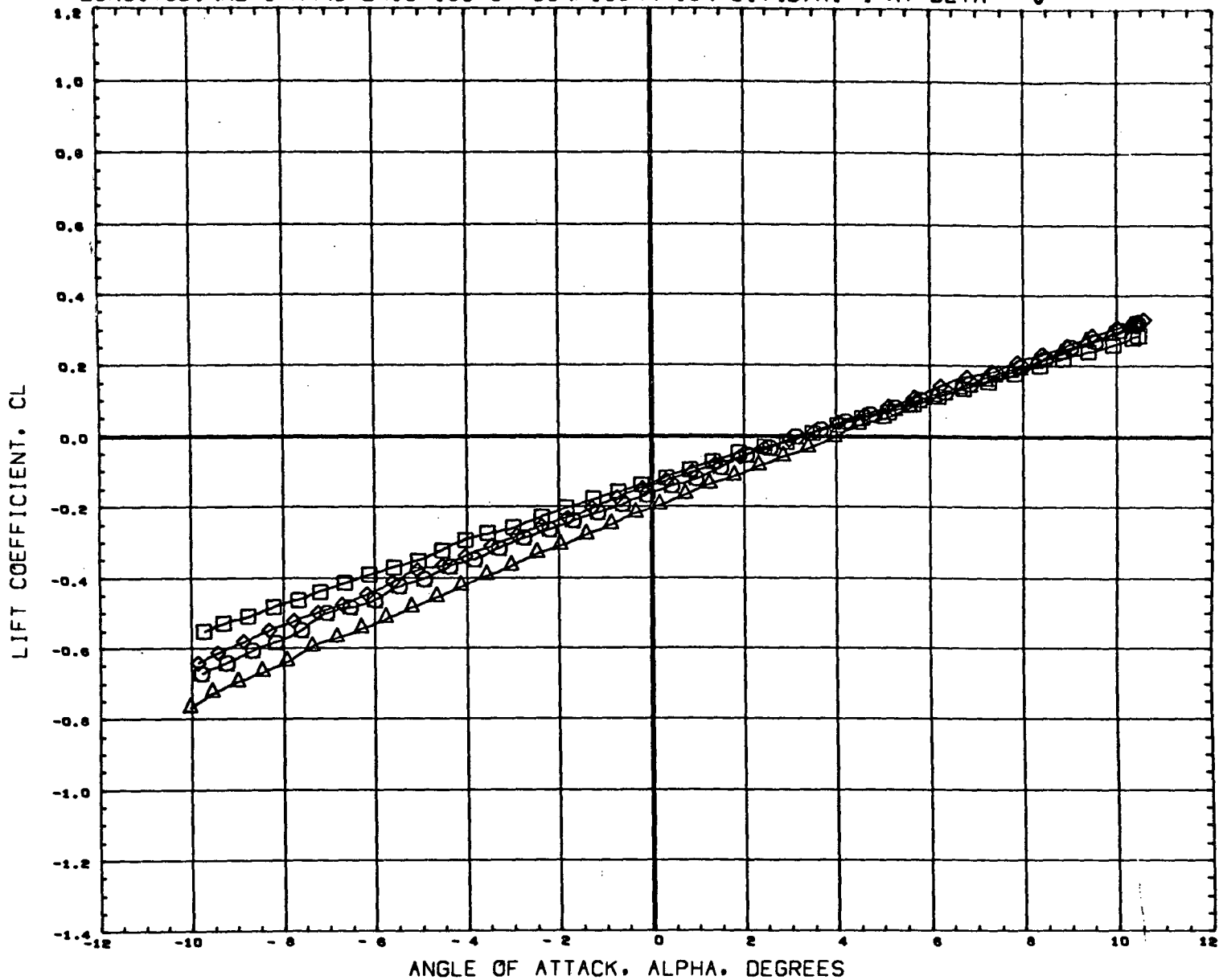
DATA HIST. CODE TV

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 662.0004 | IN. |
| XMRP | 537.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4

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LONGITUDINAL CHARACTERISTICS OF CONFIGURATION 01T4B7A1-4 AT BETA = 0

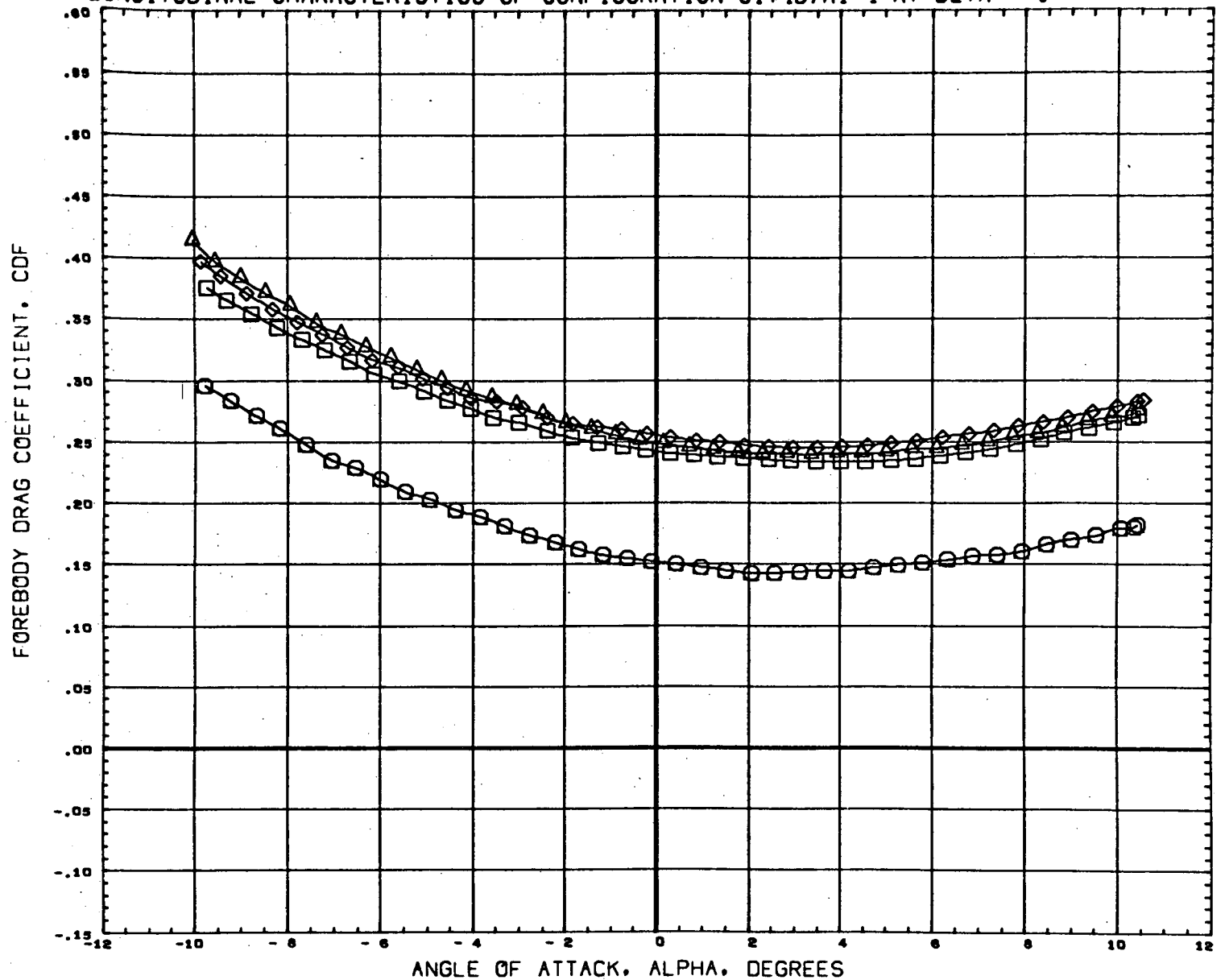


| SYMBOL | MACH | PARAMETRIC VALUES | | | |
|--------|-------|-------------------|-------|--------|-------|
| ○ | 0.901 | BETA | 0.000 | AILRON | 0.000 |
| ◇ | 1.093 | ELEVTR | 0.000 | RUDDER | 0.000 |
| △ | 1.507 | | | | |
| □ | 2.203 | | | | |

DATA HIST. CODE TV

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 862.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

LONGITUDINAL CHARACTERISTICS OF CONFIGURATION 01T4B7A1-4 AT BETA = 0



| SYMBOL | MACH | PARAMETRIC VALUES | | | |
|--------|-------|-------------------|-------|--------|-------|
| ○ | 0.901 | BETA | 0.000 | AILRON | 0.000 |
| △ | 1.093 | ELEVTR | 0.000 | RUDDER | 0.000 |
| ◇ | 1.507 | | | | |
| □ | 2.203 | | | | |

DATA HIST. CODE TV

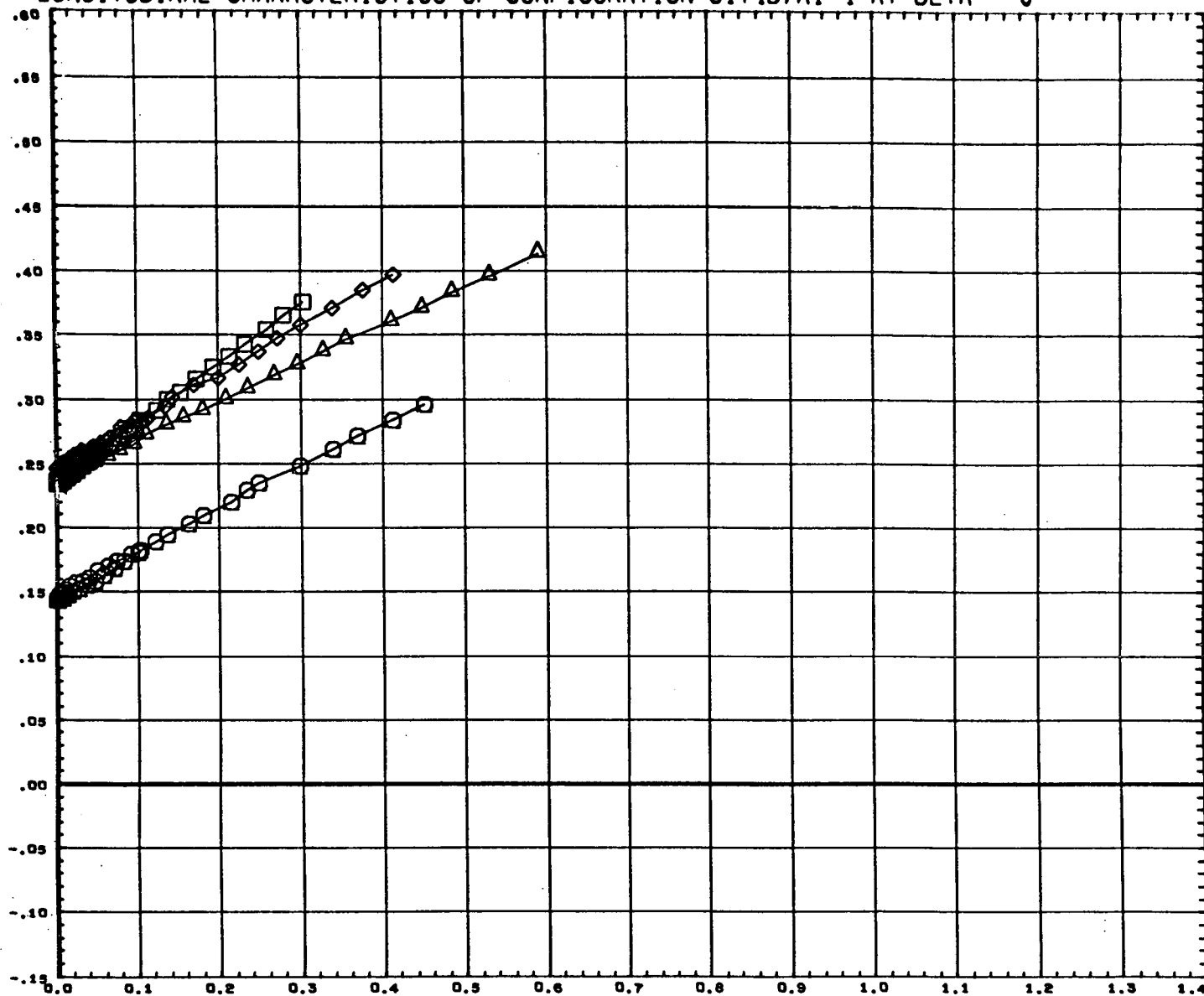
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.3004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 357.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4

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LONGITUDINAL CHARACTERISTICS OF CONFIGURATION 01T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



| SYMBOL | MACH | PARAMETRIC VALUES | | | |
|--------|-------|-------------------|-------|--------|-------|
| ○ | 0.901 | BETA | 0.000 | AILRON | 0.000 |
| △ | 1.093 | ELEVTR | 0.000 | RUDDER | 0.000 |
| ◇ | 1.507 | | | | |
| □ | 2.203 | | | | |

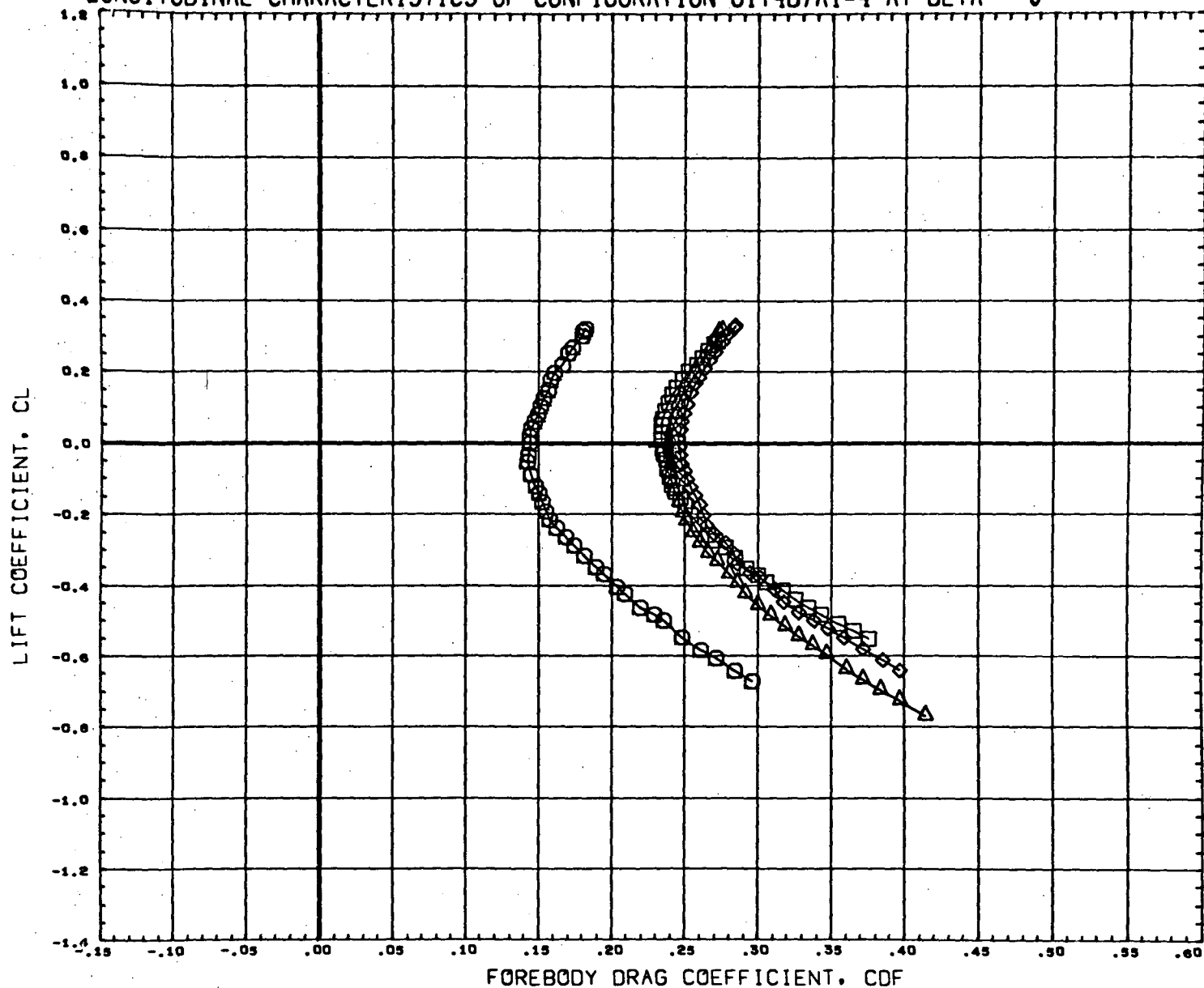
DATA HIST. CODE TV

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4

(CD7572) 12 SEP 72 PAGE 86

LONGITUDINAL CHARACTERISTICS OF CONFIGURATION 01T4B7A1-4 AT BETA = 0



| SYMBOL | MACH | PARAMETRIC VALUES | | | |
|--------|-------|-------------------|-------|--------|-------|
| ○ | 0.901 | BETA | 0.000 | AILRON | 0.000 |
| △ | 1.093 | ELEVTR | 0.000 | RUDDER | 0.000 |
| ◇ | 1.507 | | | | |
| □ | 2.203 | | | | |

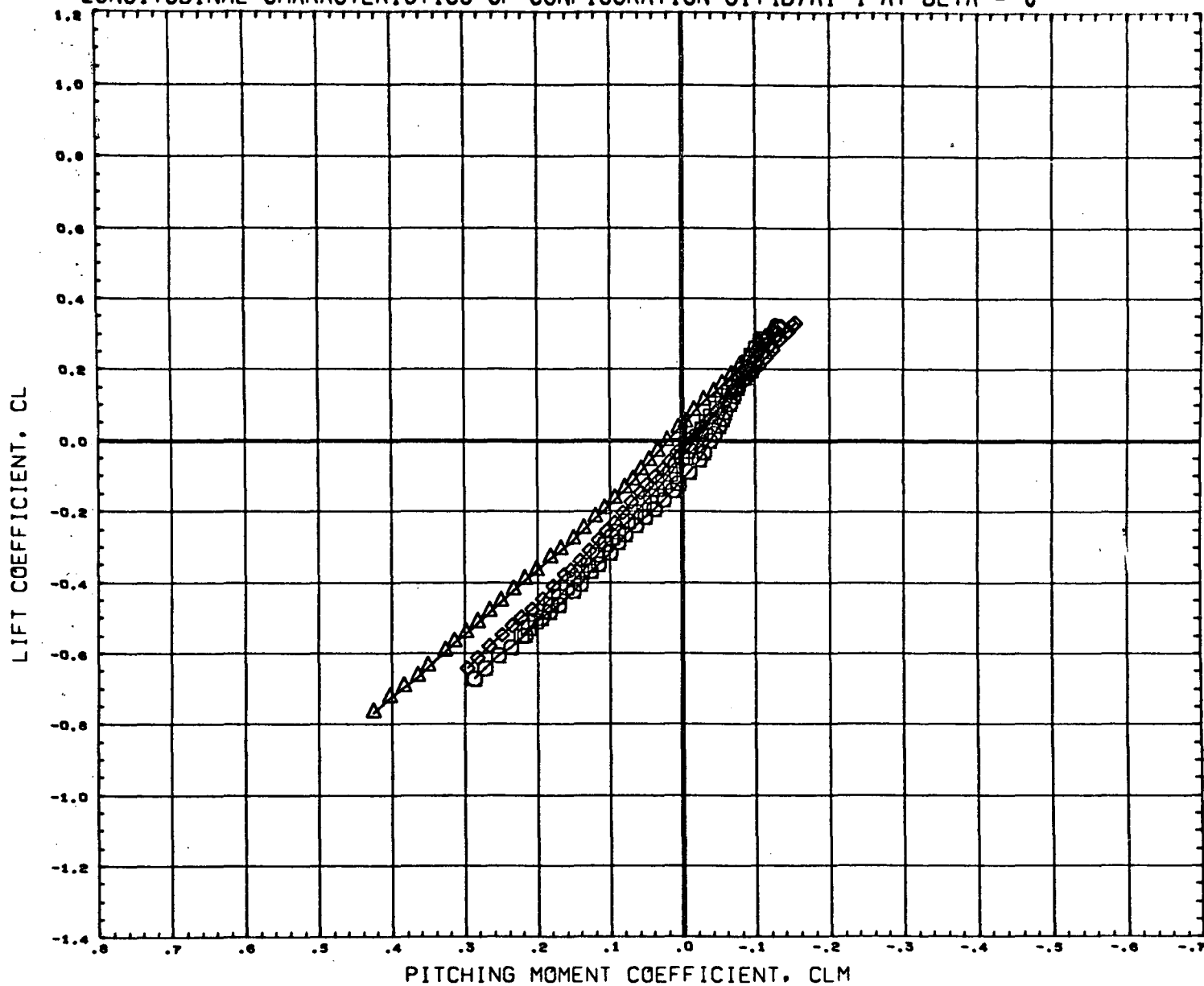
DATA HIST. CODE TV

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | sq.ft. |
| LREF | 609.5004 | in. |
| BREF | 892.0004 | in. |
| XMRP | 957.0004 | in. |
| YMRP | 0.0000 | in. |
| ZMRP | 200.0004 | in. |
| SCALE | 0.0060 | |

MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4

(CD7572) 12 SEP 72 PAGE 87

LONGITUDINAL CHARACTERISTICS OF CONFIGURATION 01T4B7A1-4 AT BETA = 0

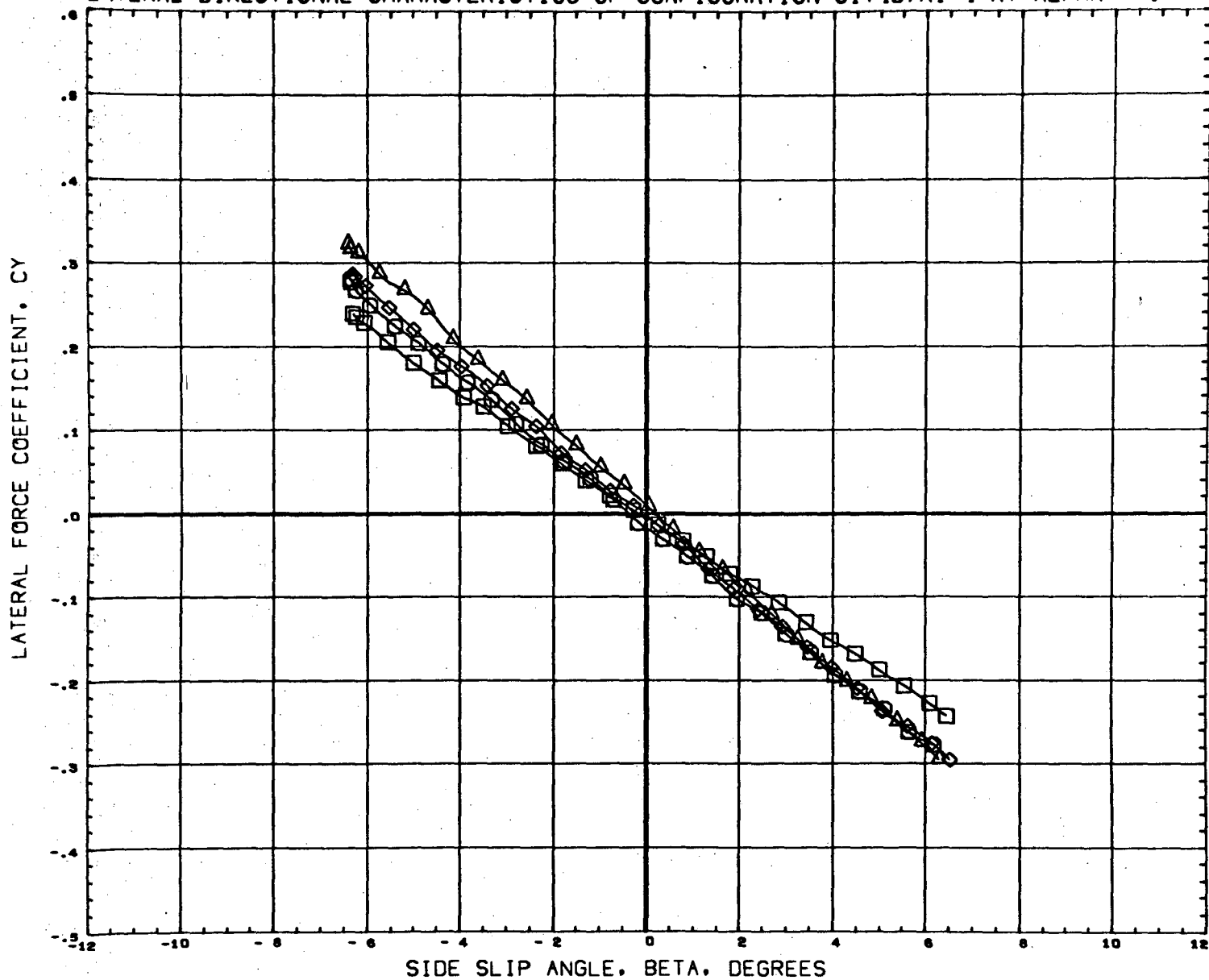


| SYMBOL | MACH | PARAMETRIC VALUES | | | |
|--------|-------|-------------------|-------|--------|-------|
| ○ | 0.901 | BETA | 0.000 | AILRON | 0.000 |
| △ | 1.093 | ELEVTR | 0.000 | RUDDER | 0.000 |
| ◇ | 1.507 | | | | |
| □ | 2.203 | | | | |

DATA HIST. CODE TV

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

LATERAL-DIRECTIONAL CHARACTERISTICS OF CONFIGURATION 01T4B7A1-4 AT ALPHA = 0



| SYMBOL | MACH | PARAMETRIC VALUES |
|--------|-------|---------------------------|
| ○ | 0.901 | ALPHA 0.000 AILRON 0.000 |
| △ | 1.095 | ELEVTR 0.000 RUDDER 0.000 |
| ◇ | 1.507 | |
| □ | 2.203 | |

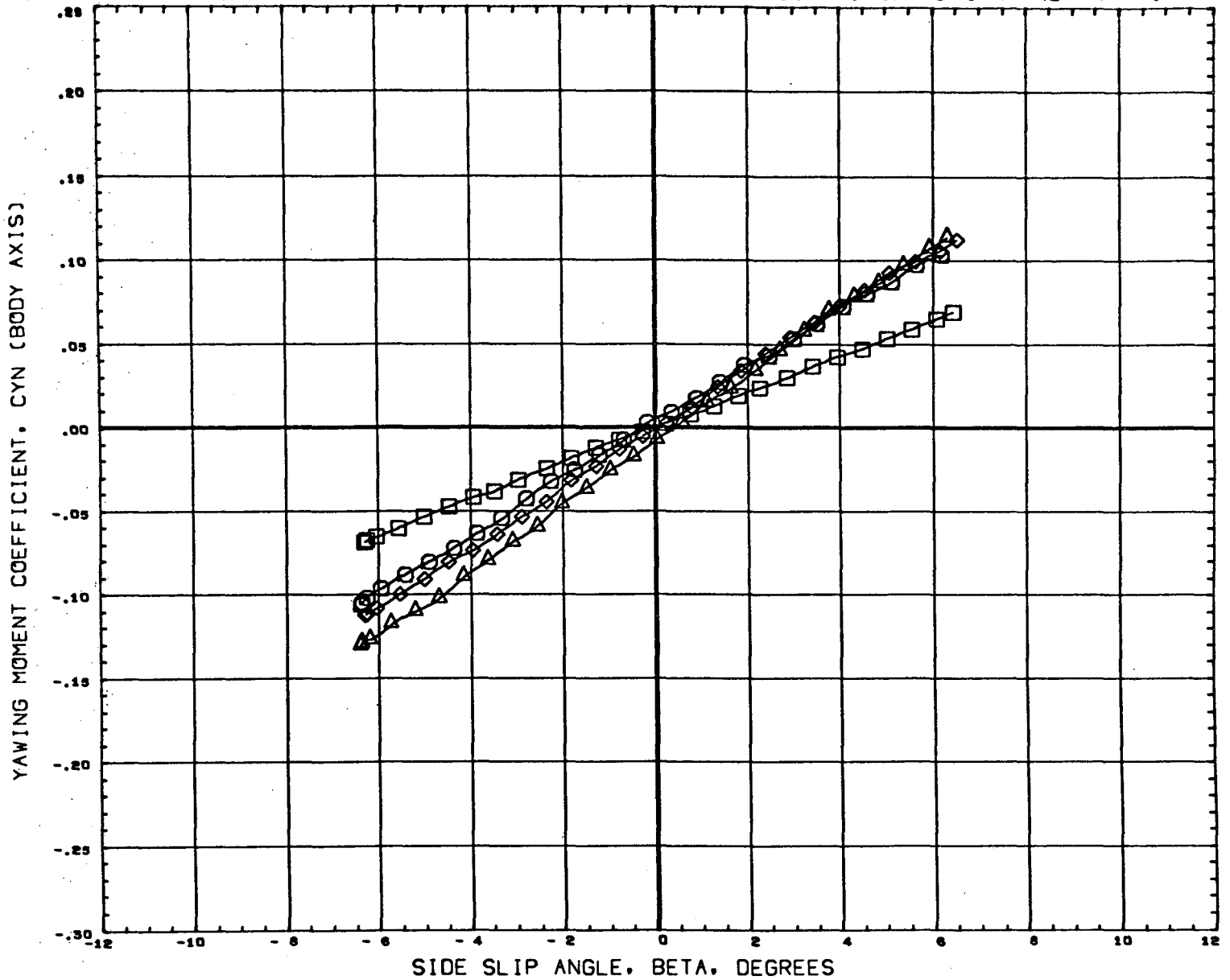
REFERENCE FILE

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4

(RD7573) 17 MAR 72 PAGE 89

LATERAL-DIRECTIONAL CHARACTERISTICS OF CONFIGURATION 01T4B7A1-4 AT ALPHA = 0



| SYMBOL | MACH | PARAMETRIC VALUES |
|--------|-------|---------------------------|
| ○ | 0.901 | ALPHA 0.000 AILRON 0.000 |
| △ | 1.095 | ELEVTR 0.000 RUDDER 0.000 |
| ◇ | 1.507 | |
| □ | 2.203 | |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

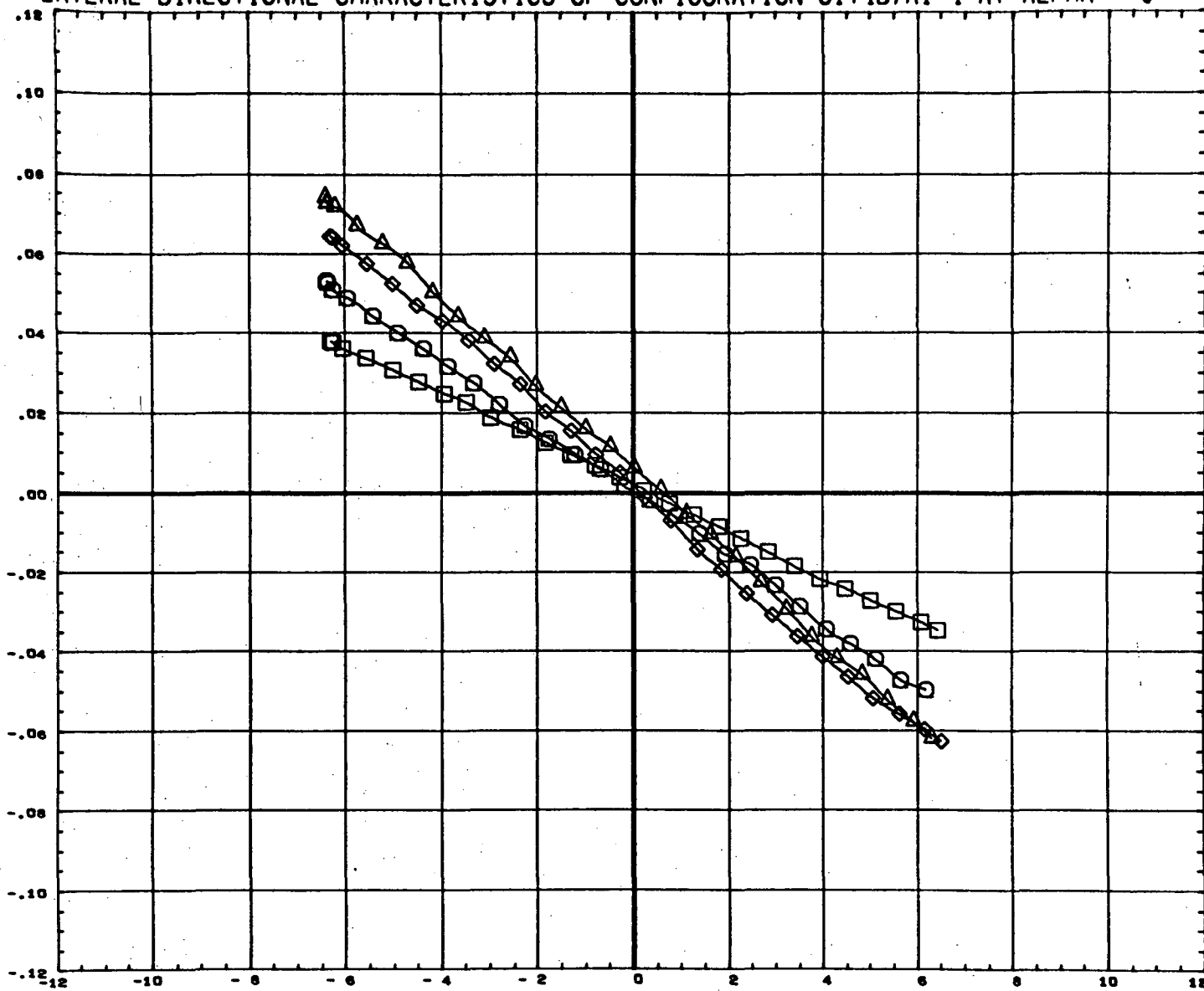
REFERENCE FILE

MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4

(RD7573) 17 MAR 72 PAGE 90

LATERAL-DIRECTIONAL CHARACTERISTICS OF CONFIGURATION 01T4B7A1-4 AT ALPHA = 0

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



| SYMBOL | MACH | PARAMETRIC VALUES | | | |
|--------|-------|-------------------|-------|--------|-------|
| ○ | 0.901 | ALPHA | 0.000 | ATLRON | 0.000 |
| △ | 1.095 | ELEVTR | 0.000 | RUDDER | 0.000 |
| ◇ | 1.507 | | | | |
| □ | 2.203 | | | | |

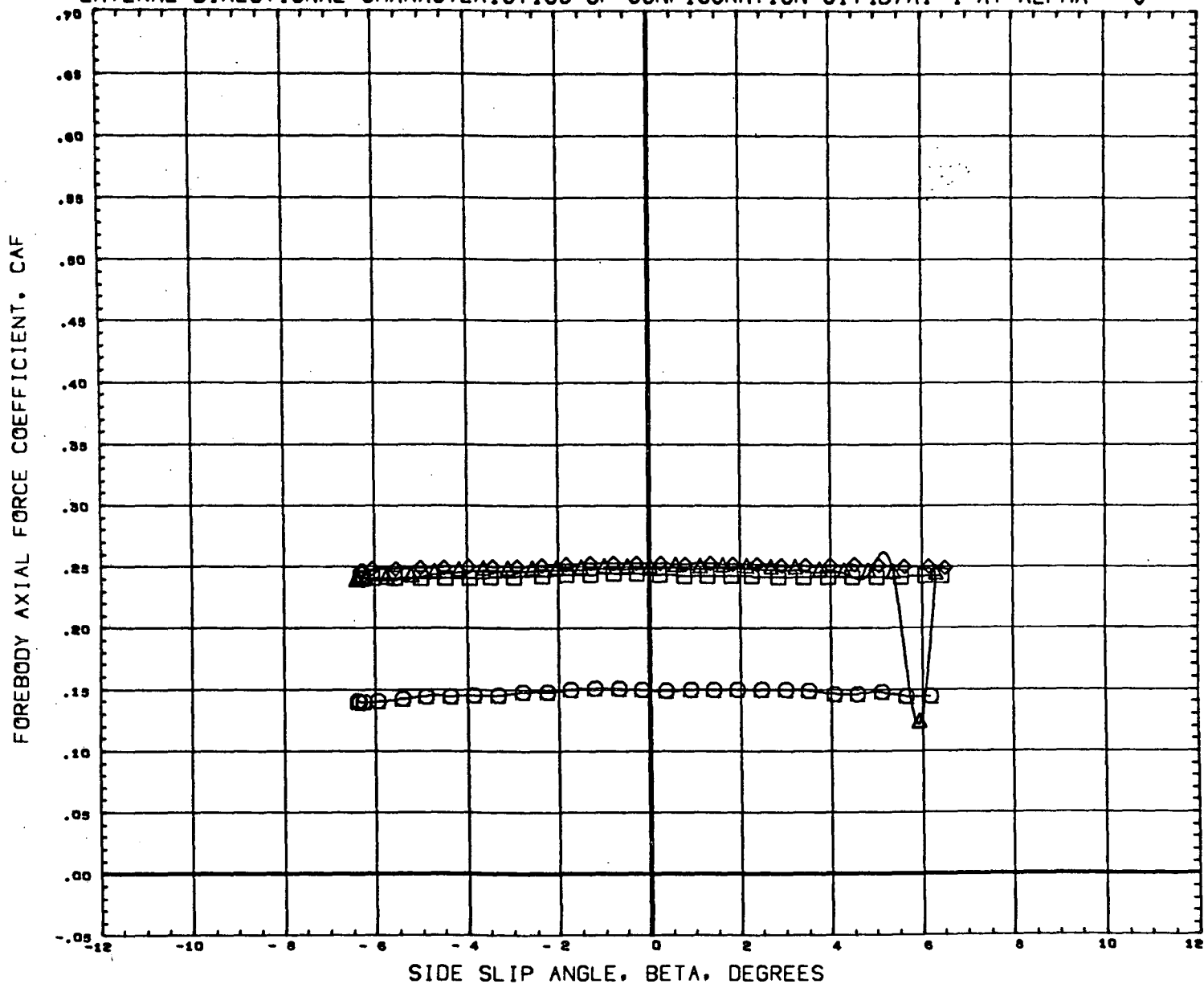
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

REFERENCE FILE

MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4

(RD7573) 17 MAR 72 PAGE 91

LATERAL-DIRECTIONAL CHARACTERISTICS OF CONFIGURATION 01T4B7A1-4 AT ALPHA = 0

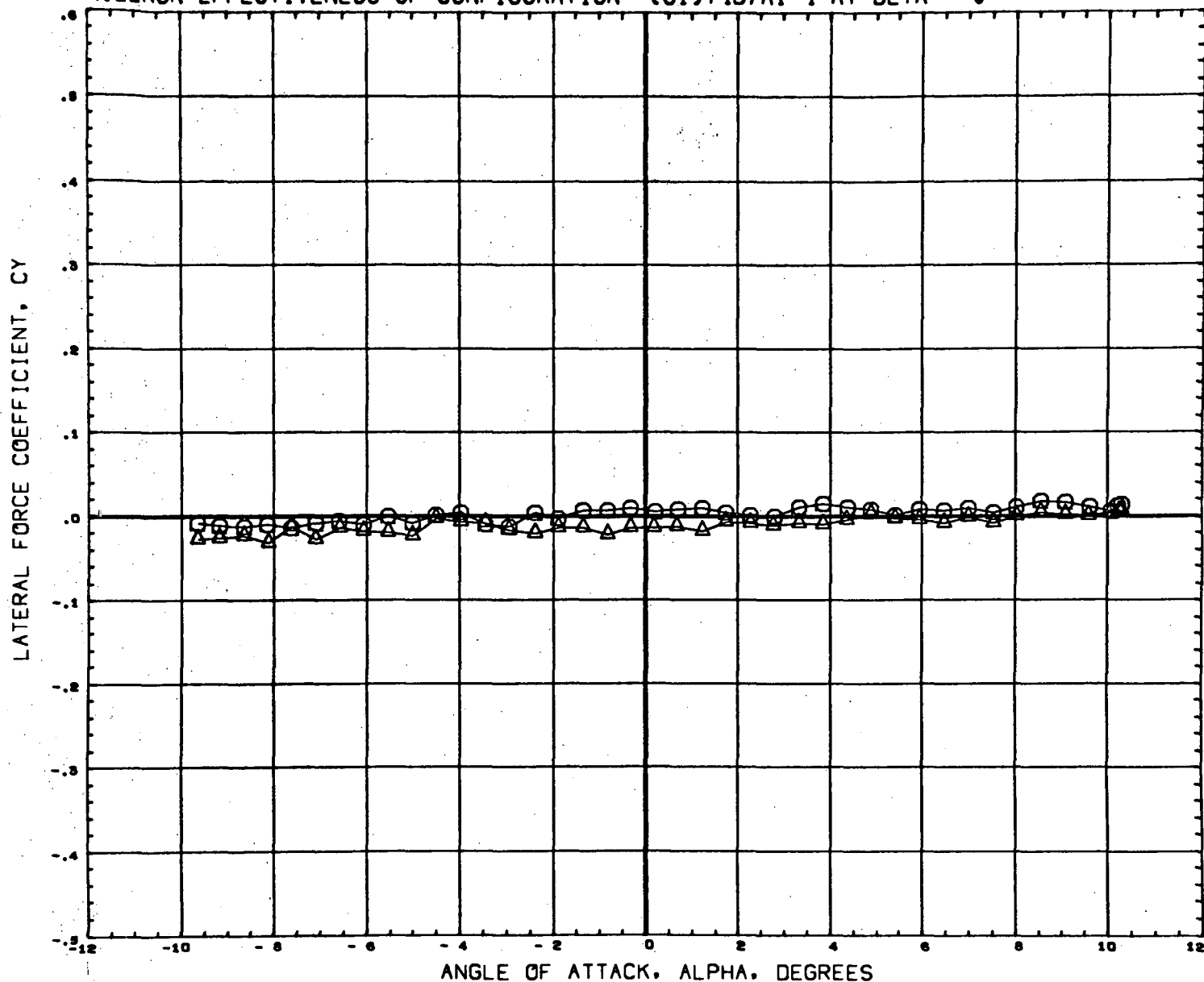


| SYMBOL | MACH | PARAMETRIC VALUES | | | |
|--------|-------|-------------------|-------|--------|-------|
| ○ | 0.901 | ALPHA | 0.000 | AILRON | 0.000 |
| △ | 1.095 | ELEVTR | 0.000 | RUDDER | 0.000 |
| ◇ | 1.507 | | | | |
| □ | 2.203 | | | | |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 662.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

REFERENCE FILE

AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0



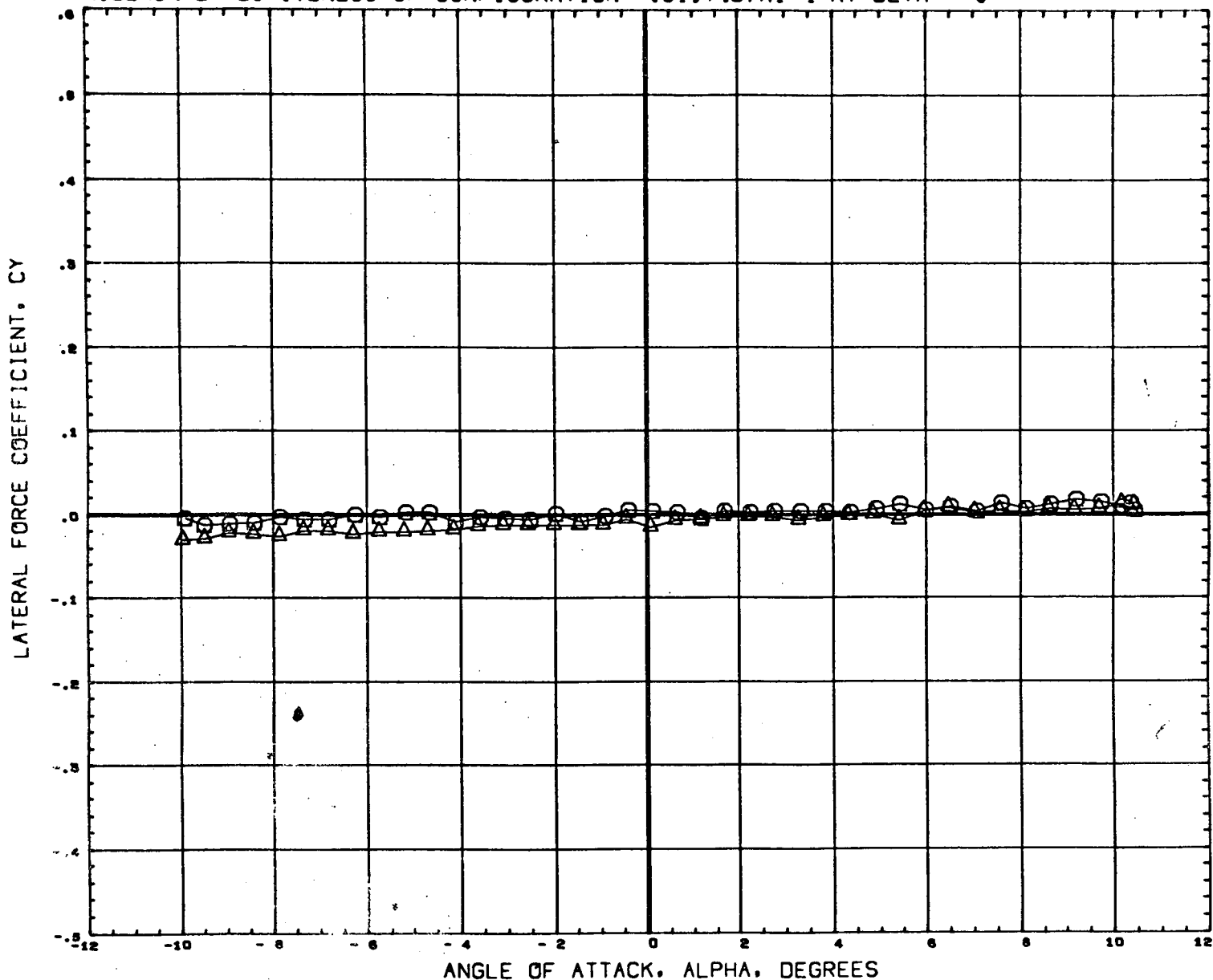
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (RD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (RD74D1) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 20.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMHP 537.0004 IN. |
| | | | | YMHP 0.0000 IN. |
| | | | | ZMHP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH .58

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AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(R074C7) \bigcirc MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
 (R074D1) \triangle MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

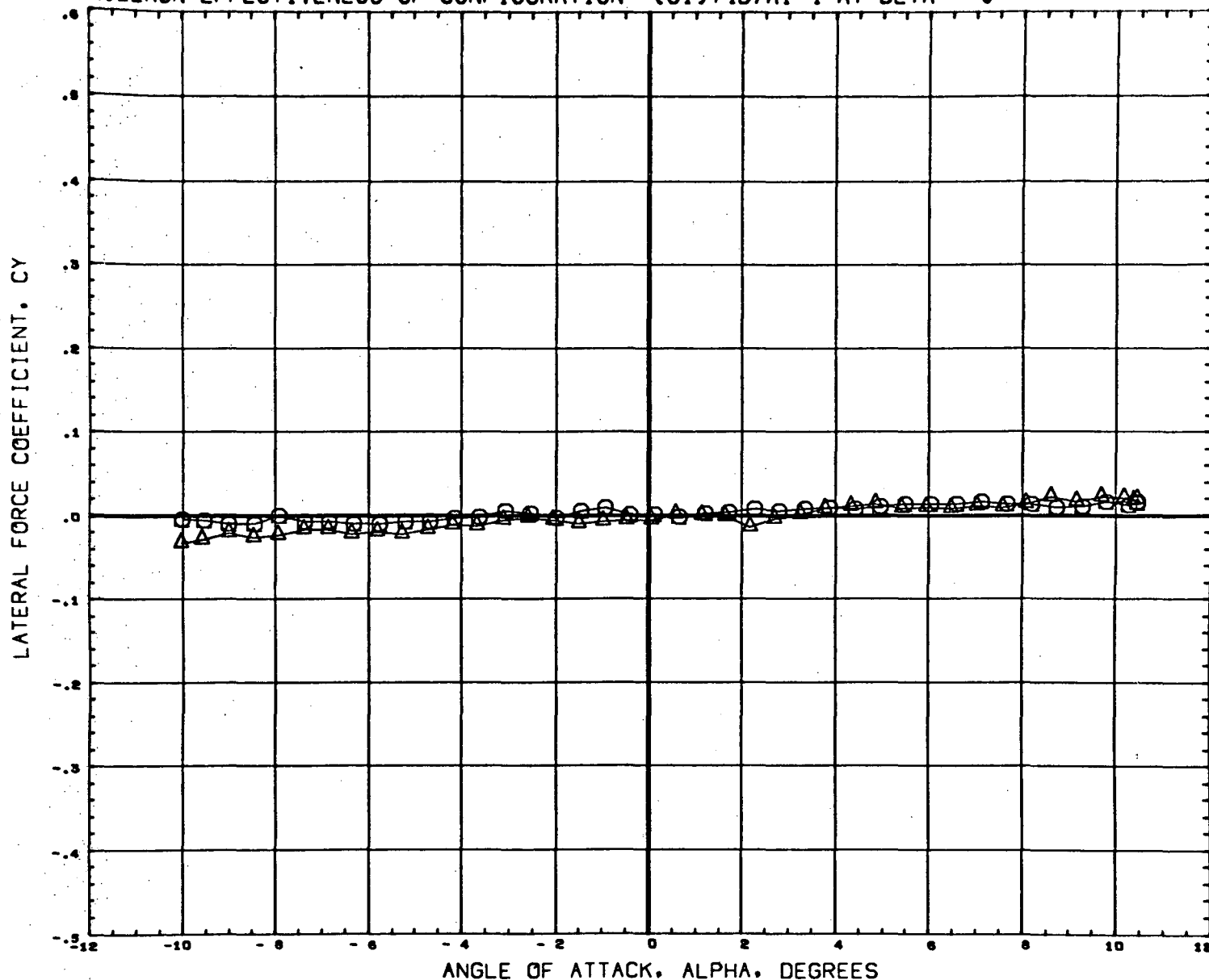
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 20.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH .90

PAGE 94

AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0

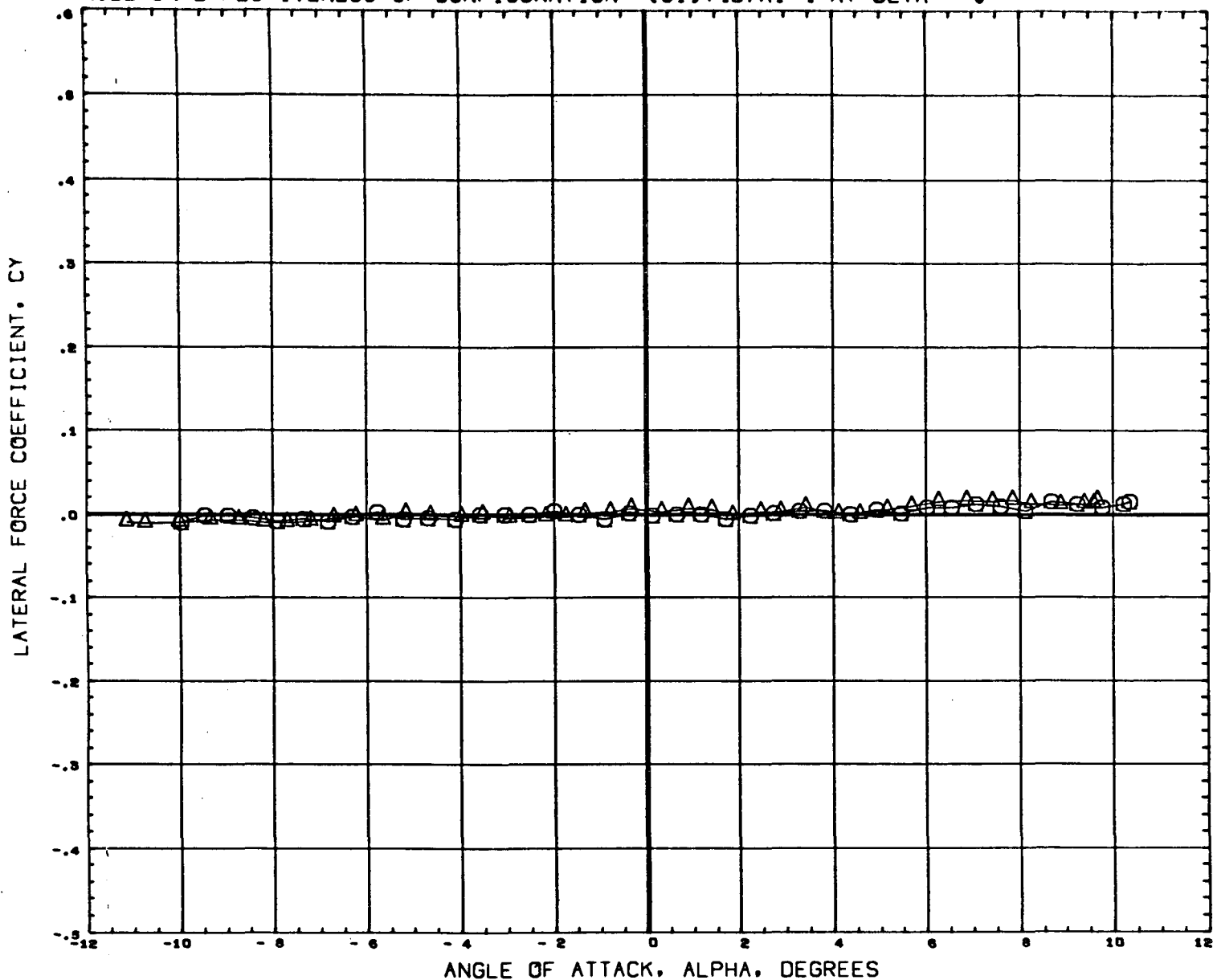


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE (T-C6) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D1) | MDAC S-222 COMPOSITE (T-C6) (01)T4B7A1-4 | 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

PAGE 95

AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0



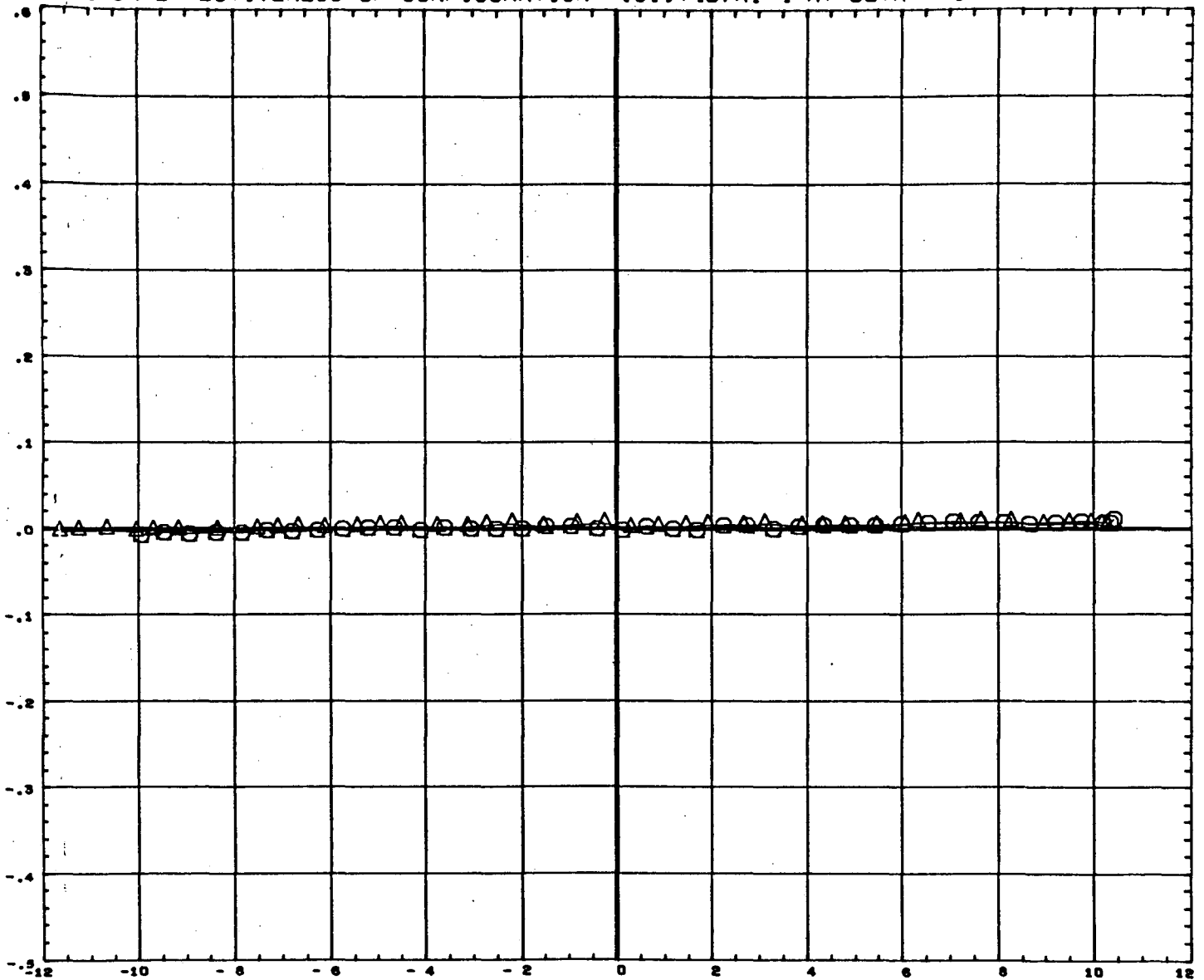
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D1) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.51

PAGE 96

AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0

LATERAL FORCE COEFFICIENT, CY



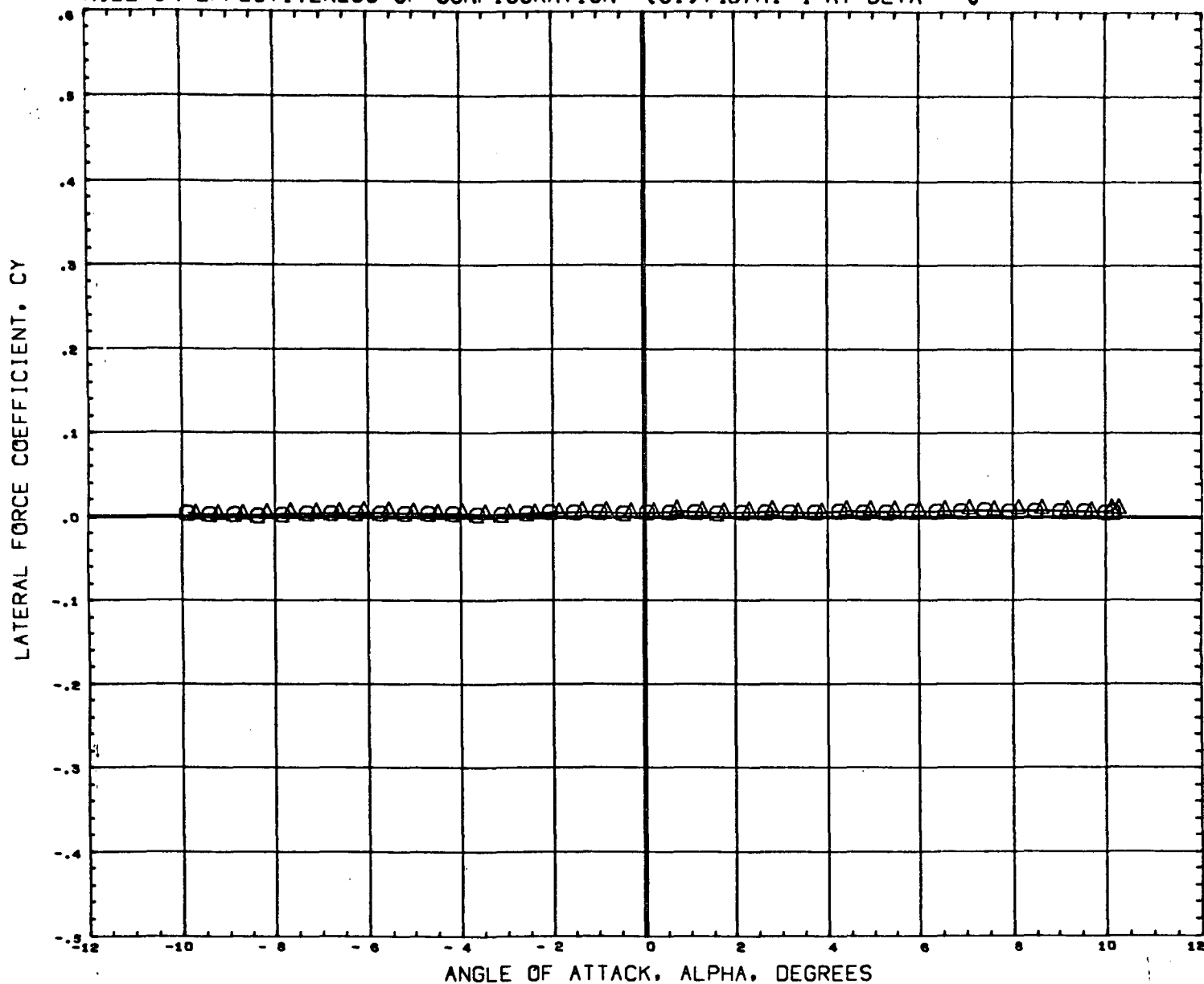
ANGLE OF ATTACK, ALPHA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE(T-C6) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D1) | MDAC S-222 COMPOSITE(T-C6) (01)T4B7A1-4 | 0.000 | 0.000 | 20.000 | 0.000 | LREF | 809.3004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

PAGE 97

AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0

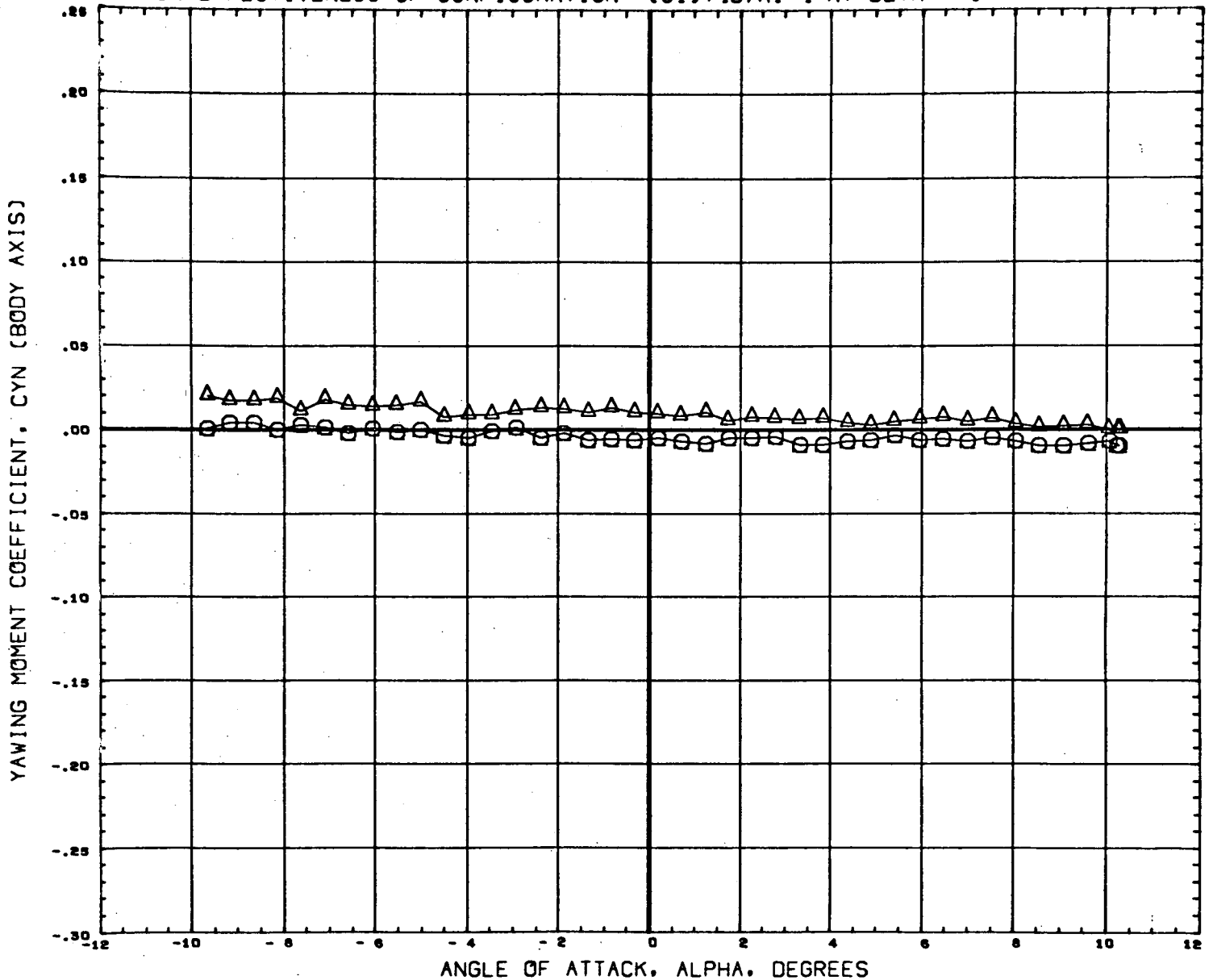


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (R074C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (R074D1) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XM RP | 557.0004 IN. |
| | | | | | | YM RP | 0.0000 IN. |
| | | | | | | ZM RP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

PAGE 98

AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0

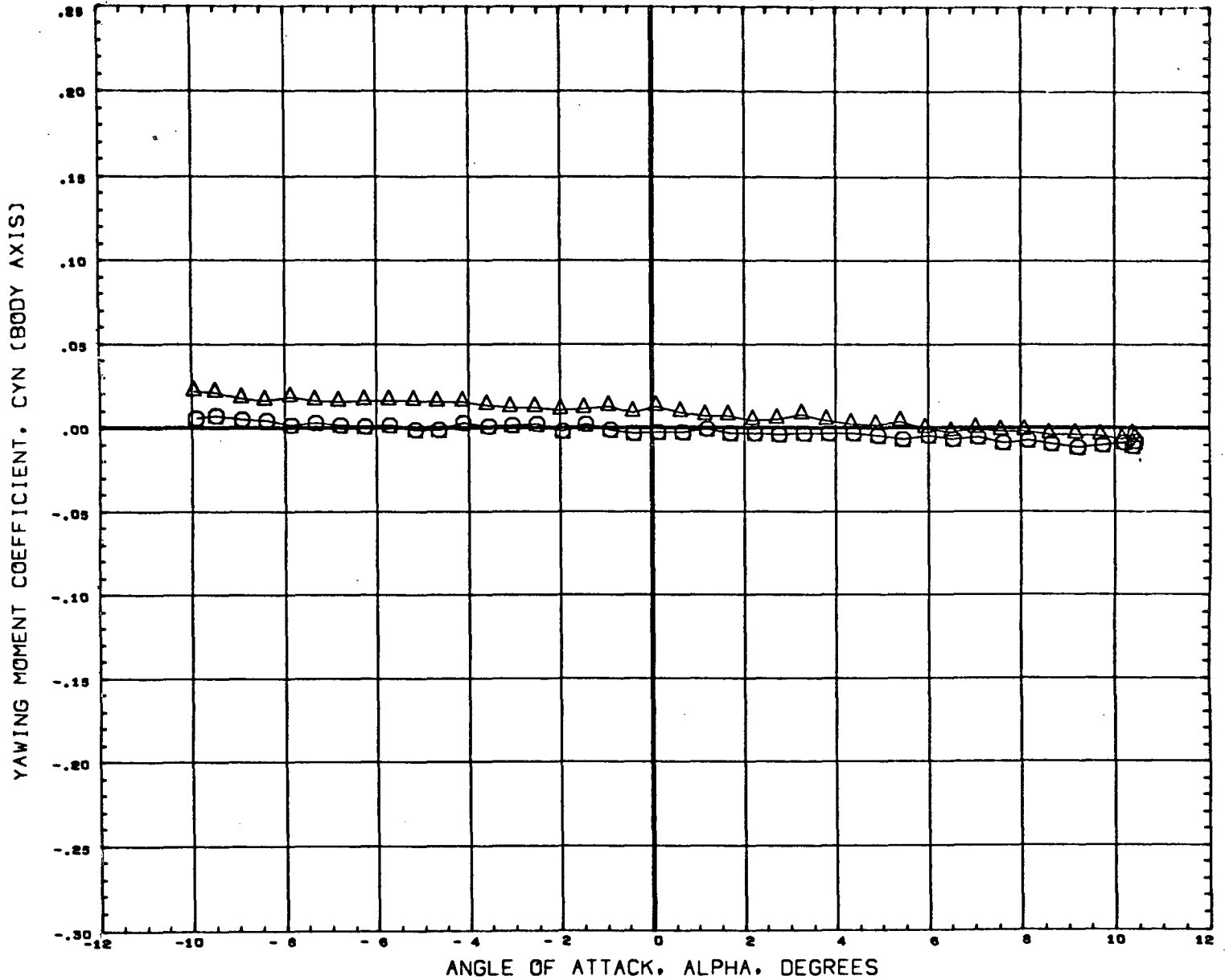


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D1) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

PAGE 99

AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D1) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 682.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

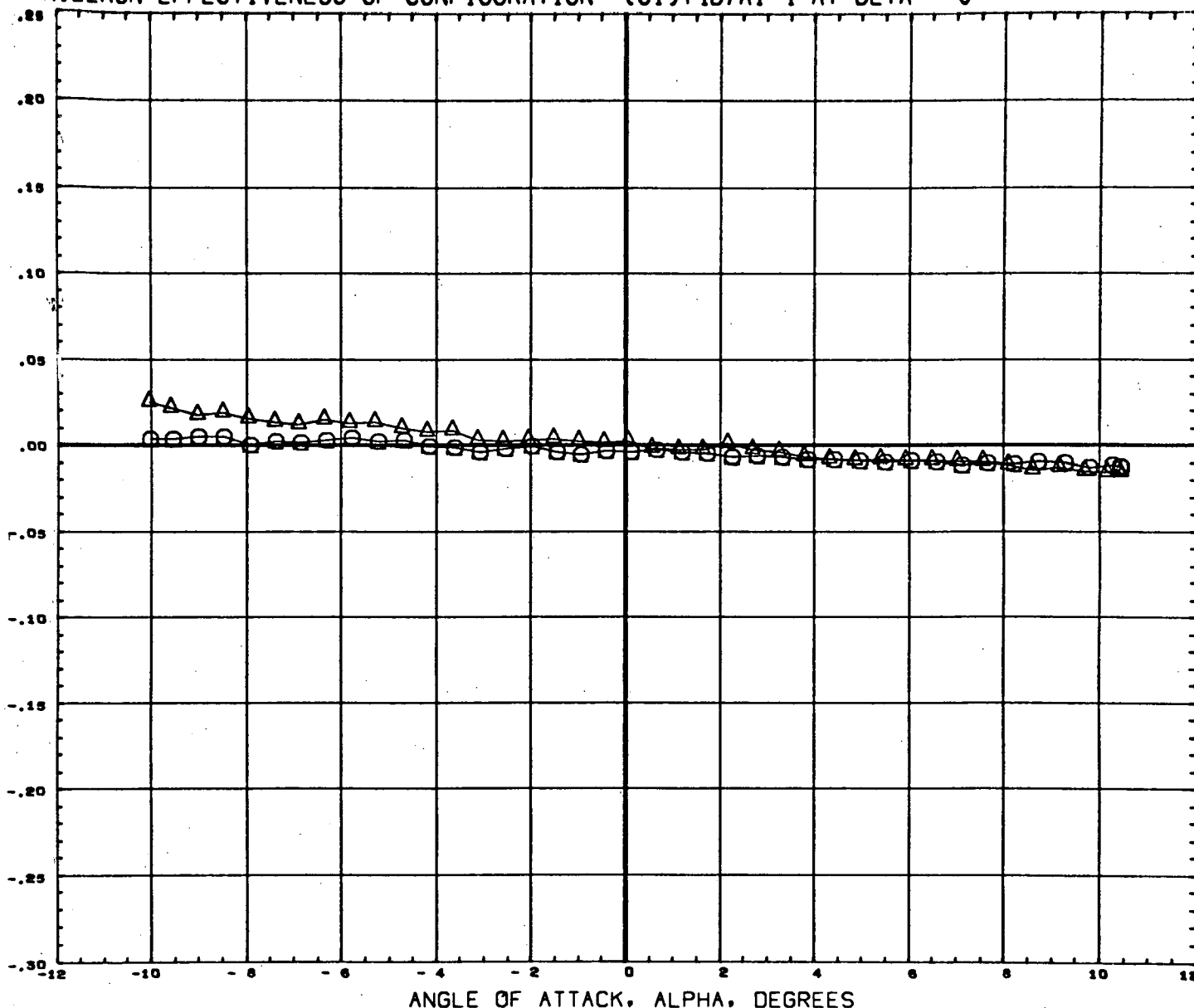
MACH

.90

PAGE 100

AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0

YAWING MOMENT COEFFICIENT, CYN (BODY AXIS)

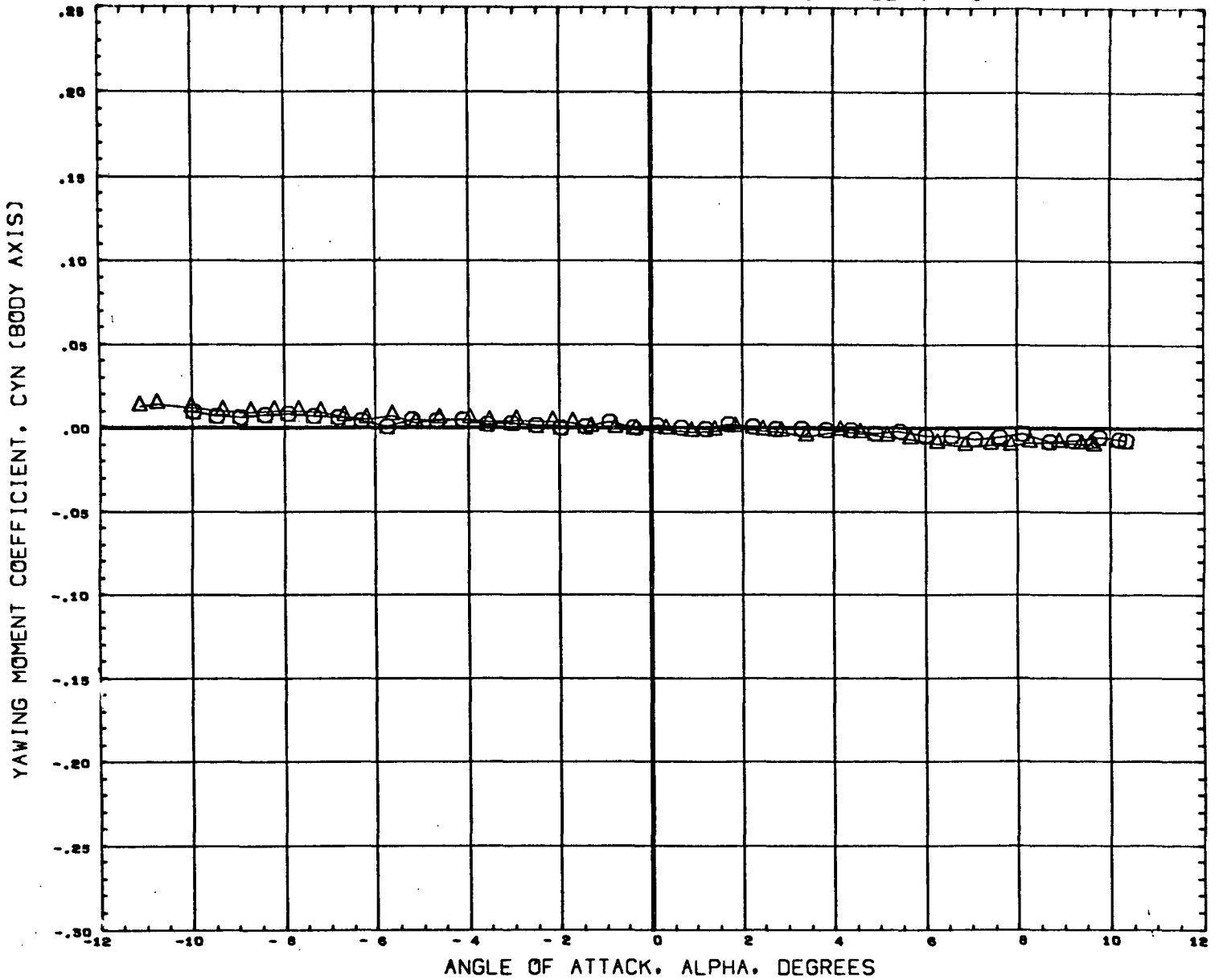


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D1) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 862.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

PAGE 101

AILERON EFFECTIVENESS OF CONFIGURATION (O1)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(RD74C7) MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4
 (RD74D1) MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 20.000 | 0.000 |

REFERENCE INFORMATION

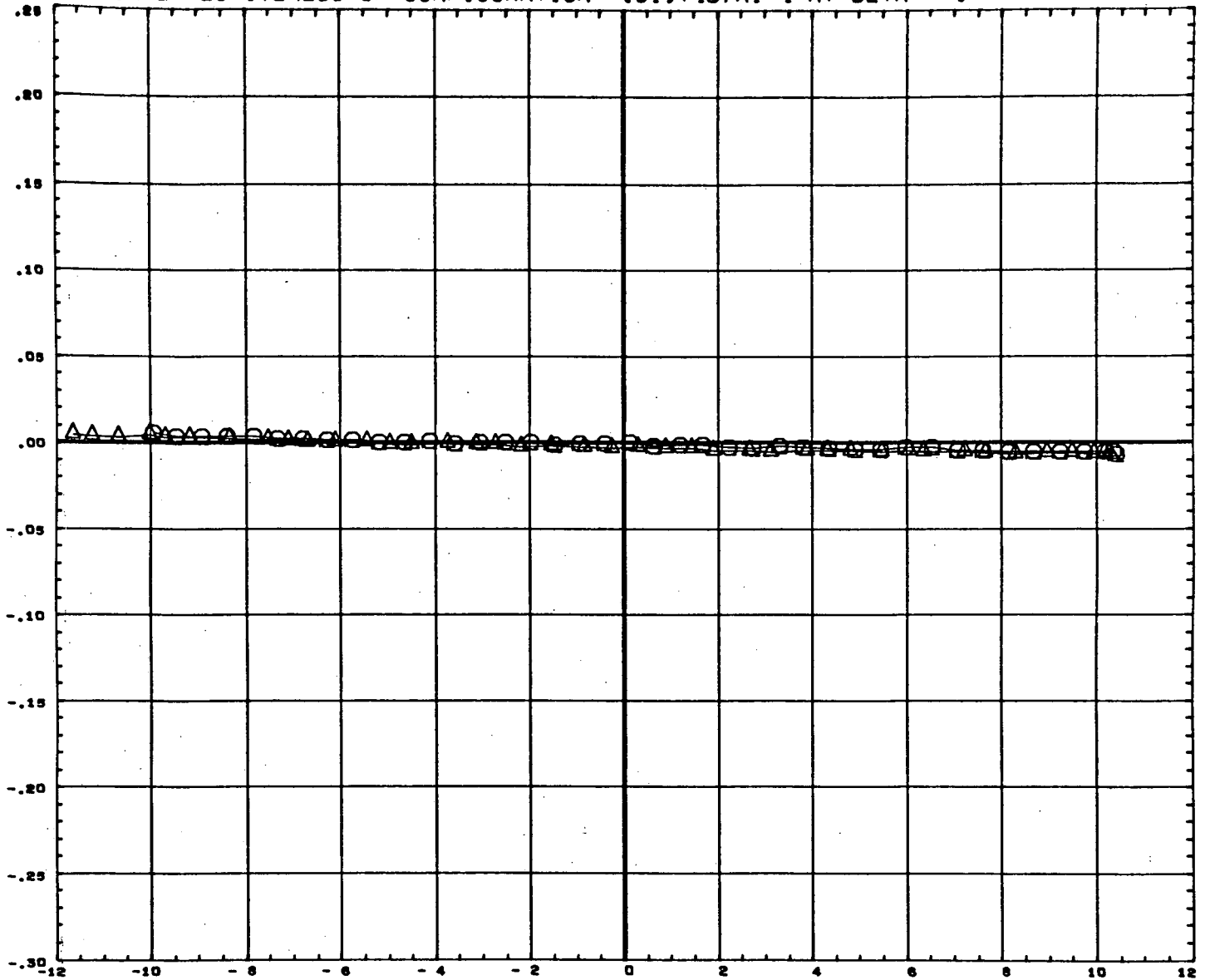
| | | |
|-------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 862.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 1.51

PAGE 102

AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0

YAWING MOMENT COEFFICIENT, CYN (BODY AXIS)



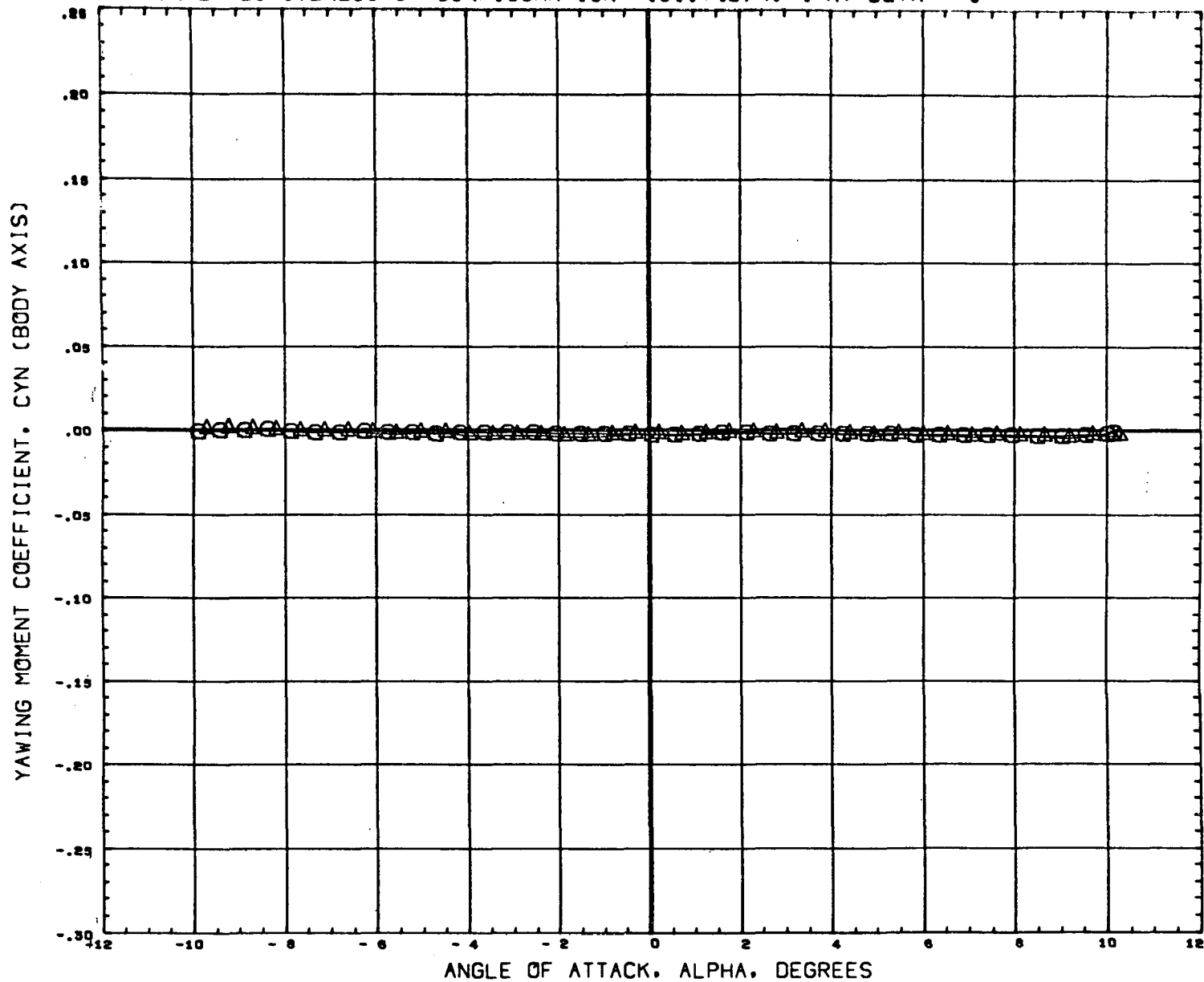
ANGLE OF ATTACK, ALPHA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D1) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

PAGE 103

AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0



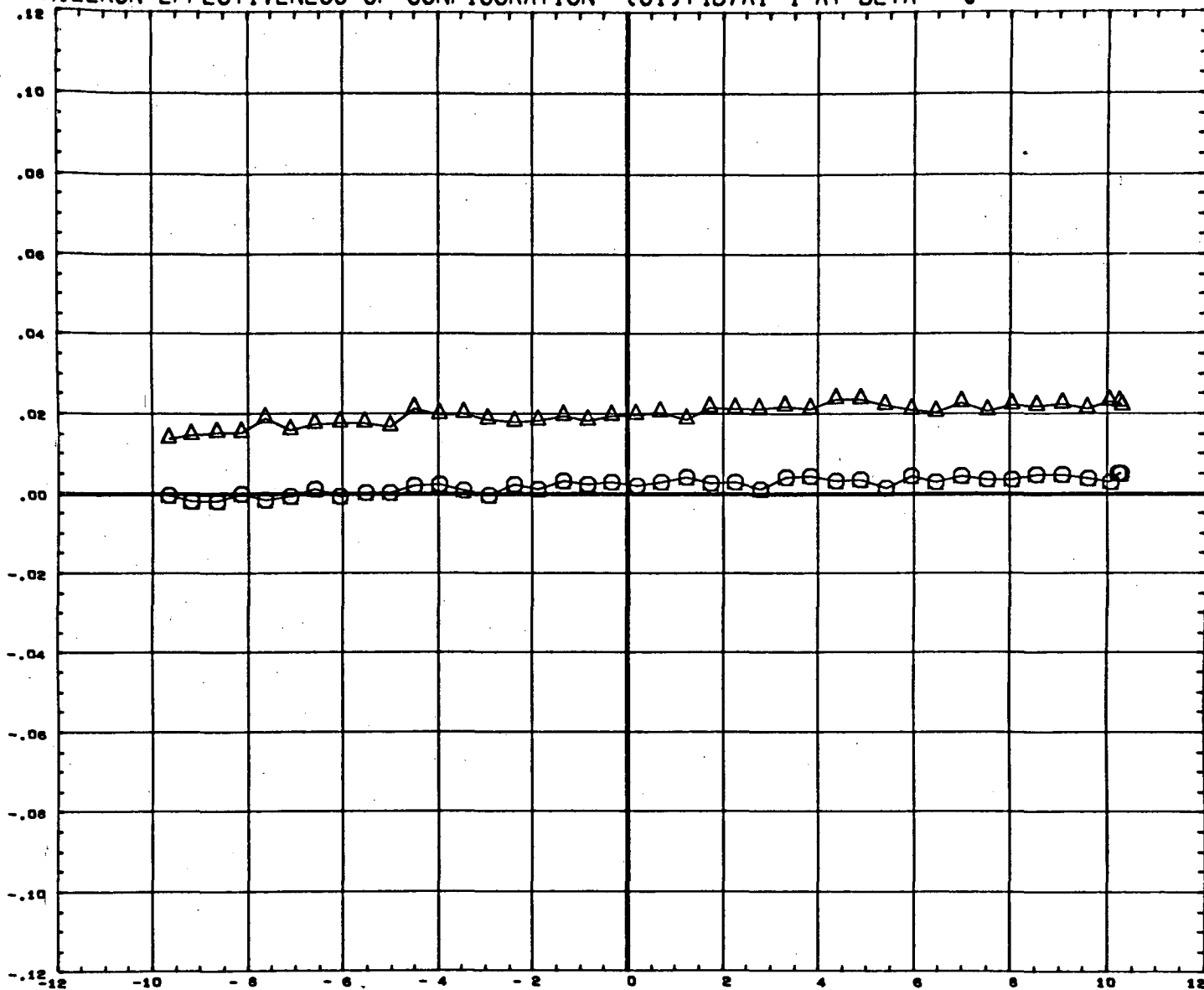
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D1) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

PAGE 104

AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



ANGLE OF ATTACK, ALPHA, DEGREES

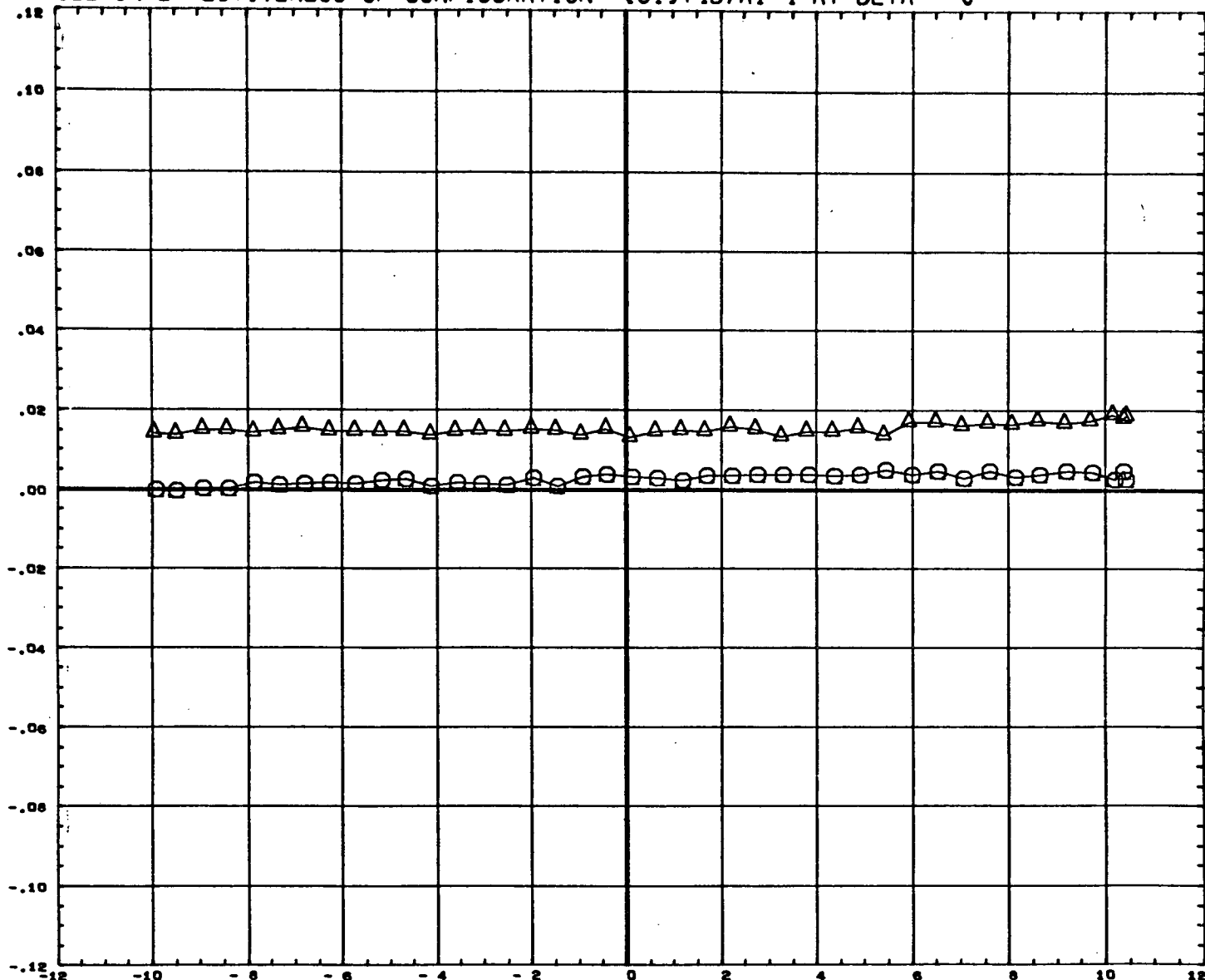
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D1) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRF | 557.0004 IN. |
| | | | | | | YMRF | 0.0000 IN. |
| | | | | | | ZMRF | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

PAGE 105

AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



ANGLE OF ATTACK, ALPHA, DEGREES

DATA SET SYMBOL CONFIGURATION DESCRIPTION

(RD74C7) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (RD74D1) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 20.000 0.000

REFERENCE INFORMATION

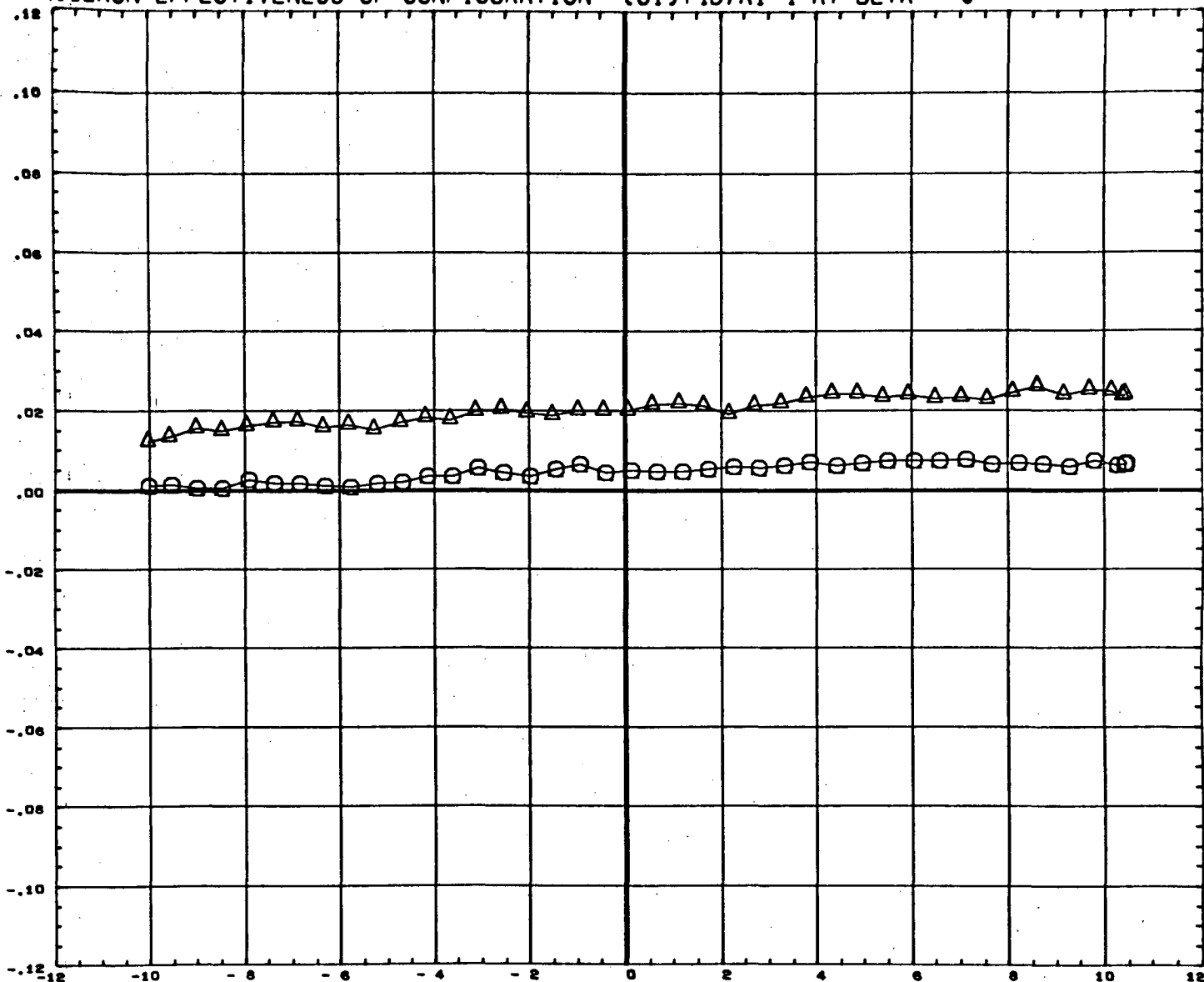
SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 682.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH .90

PAGE 106

AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



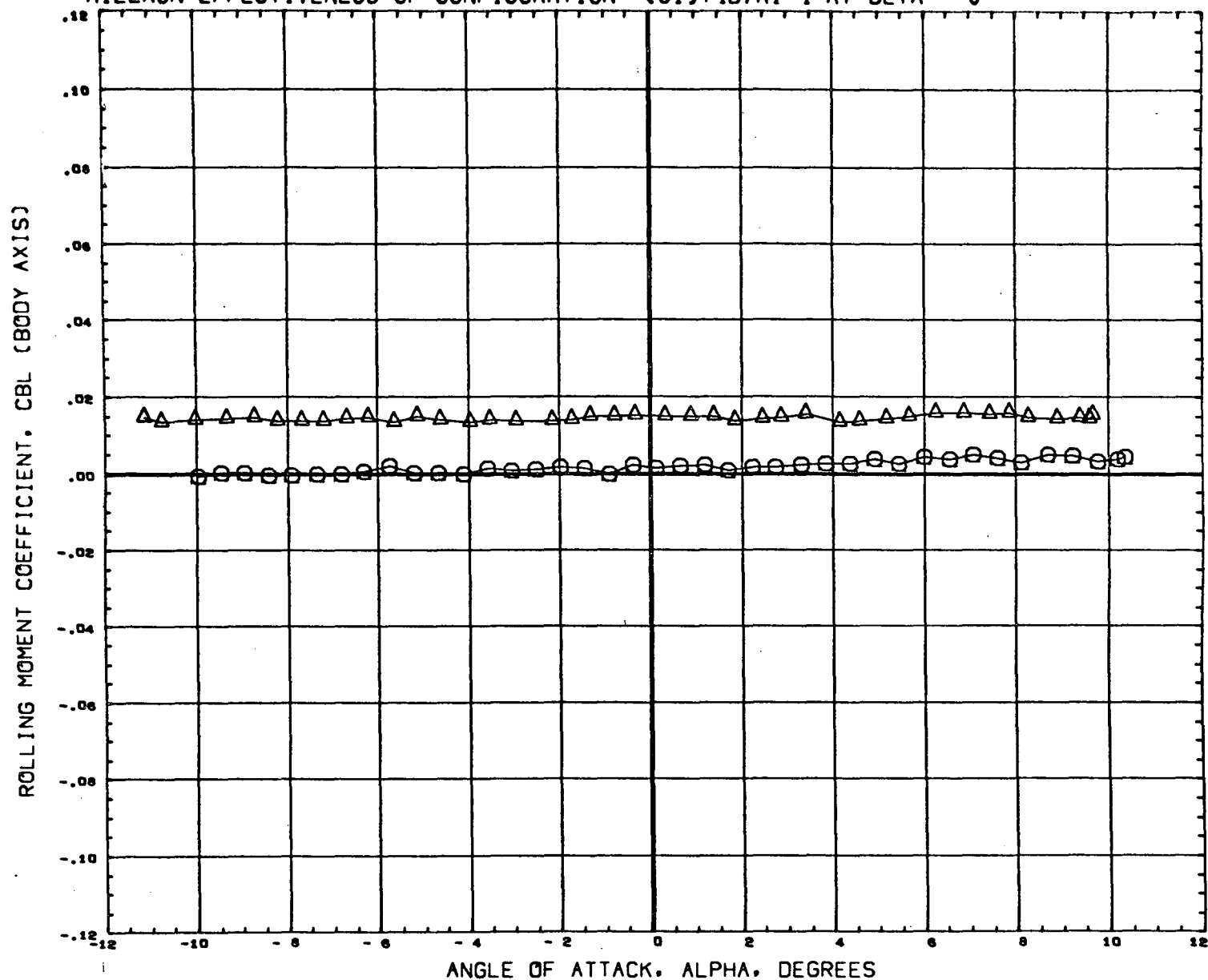
ANGLE OF ATTACK, ALPHA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D1) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

PAGE 107

AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0



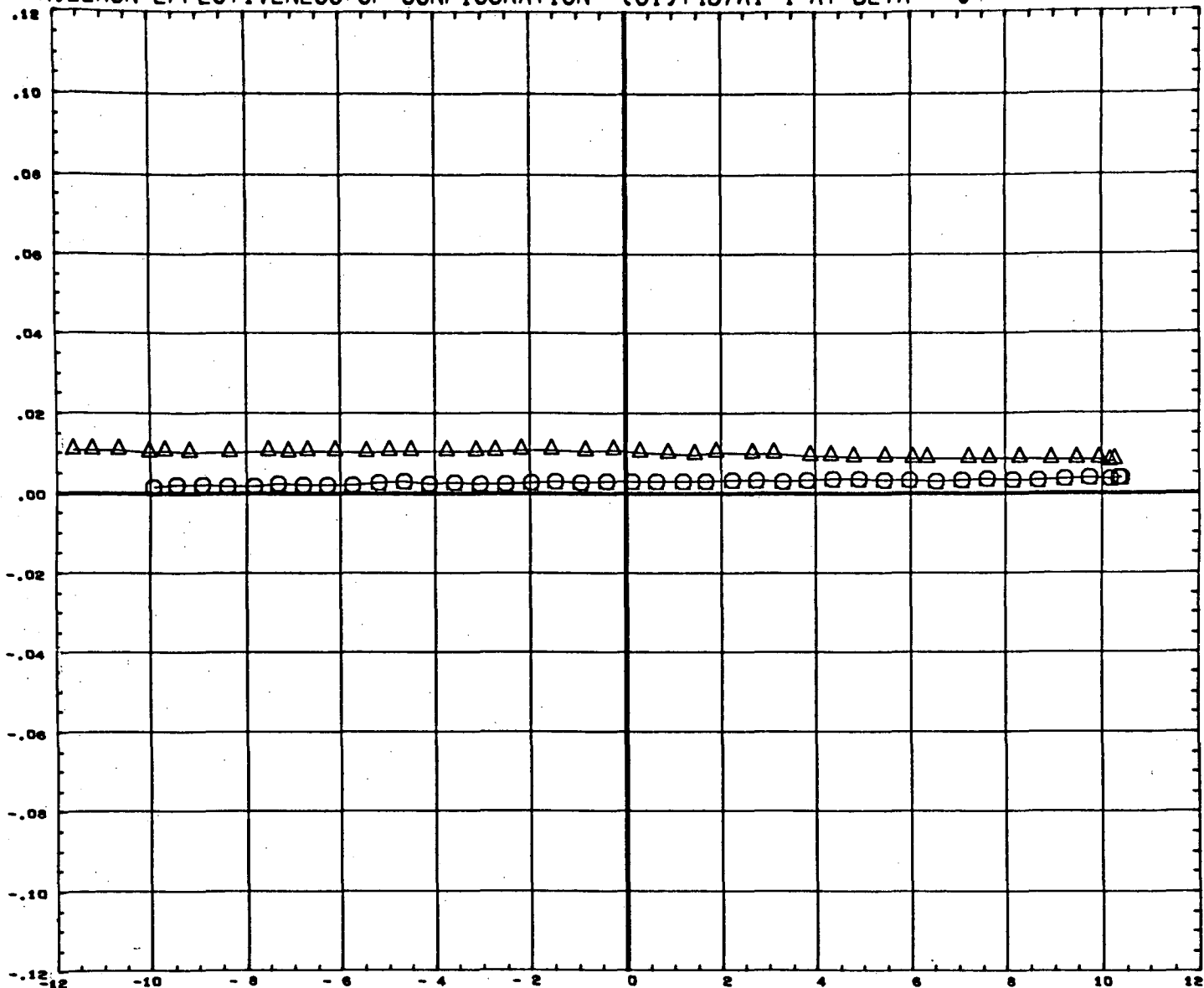
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D1) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.51

PAGE 108

AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



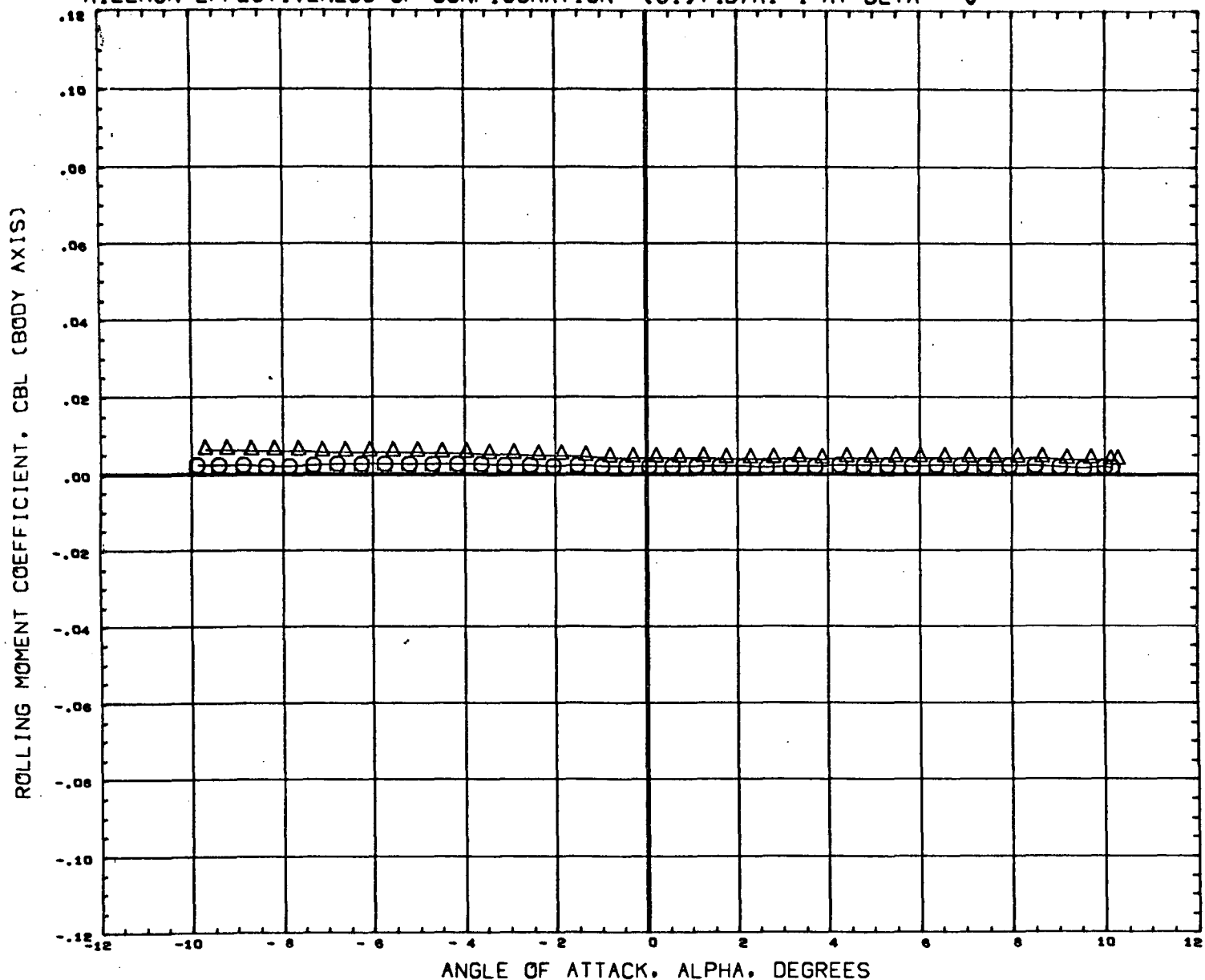
ANGLE OF ATTACK, ALPHA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D1) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

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AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0



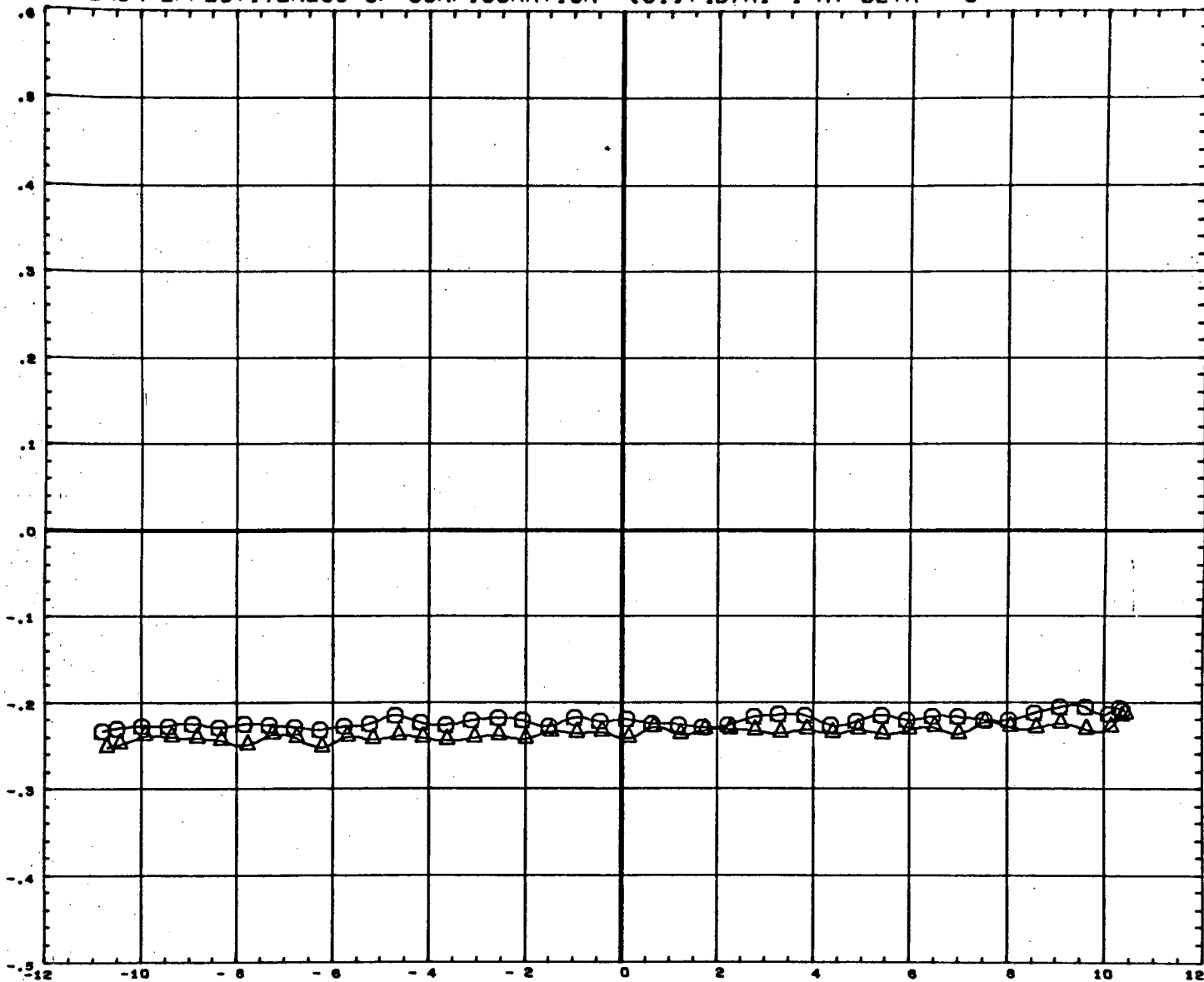
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D1) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

PAGE 110

AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 6

LATERAL FORCE COEFFICIENT, CY



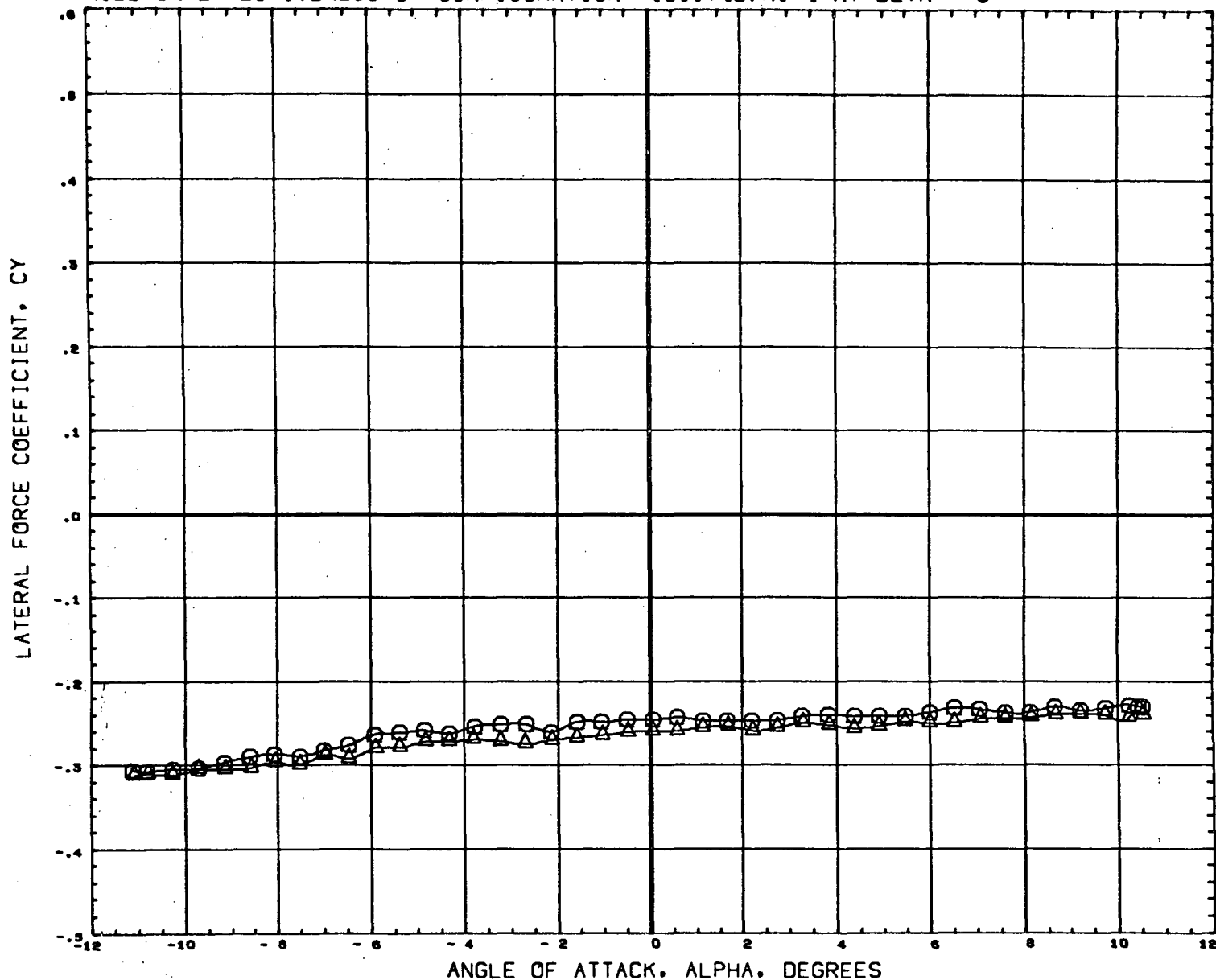
ANGLE OF ATTACK, ALPHA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

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AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 6

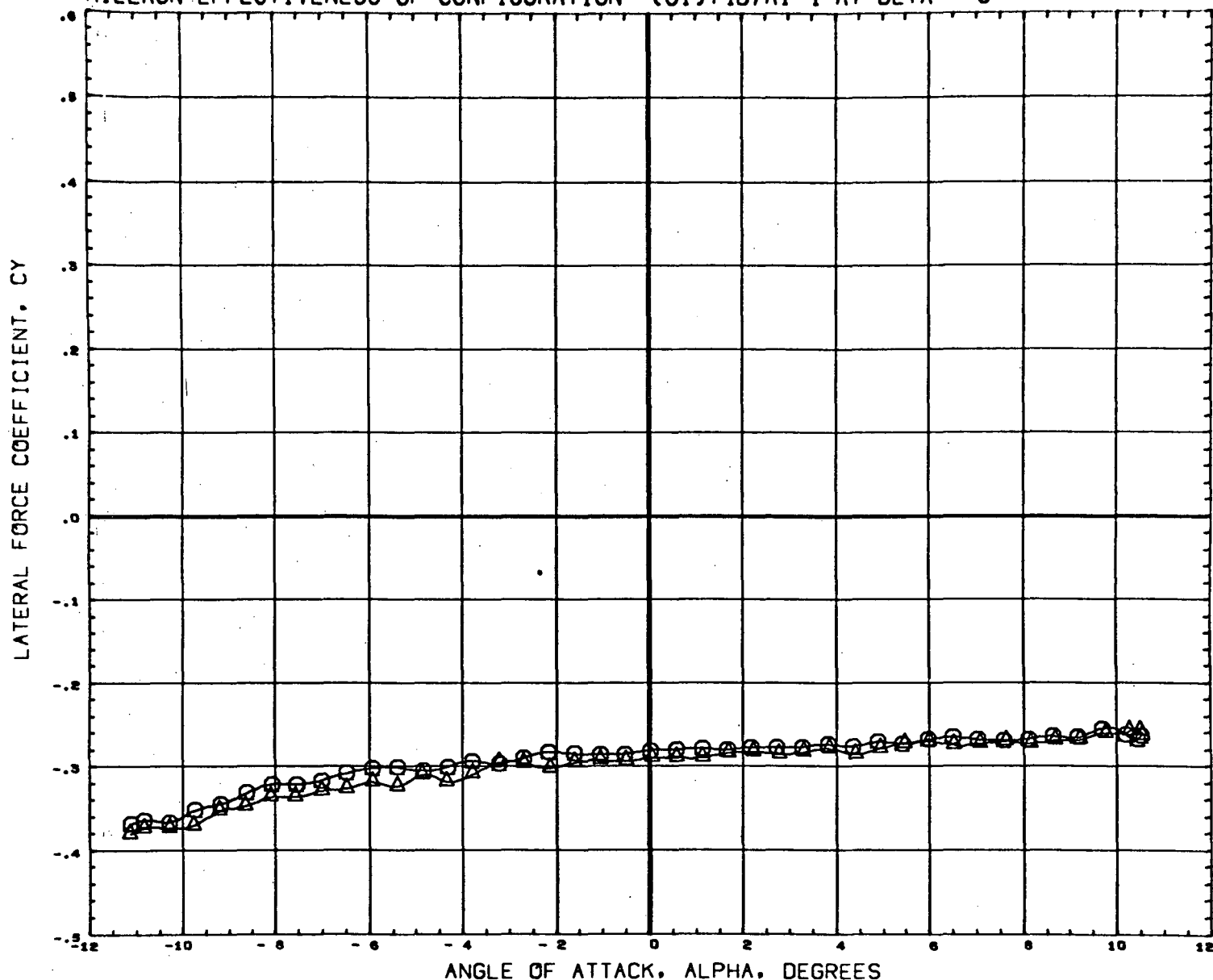


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

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AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 6



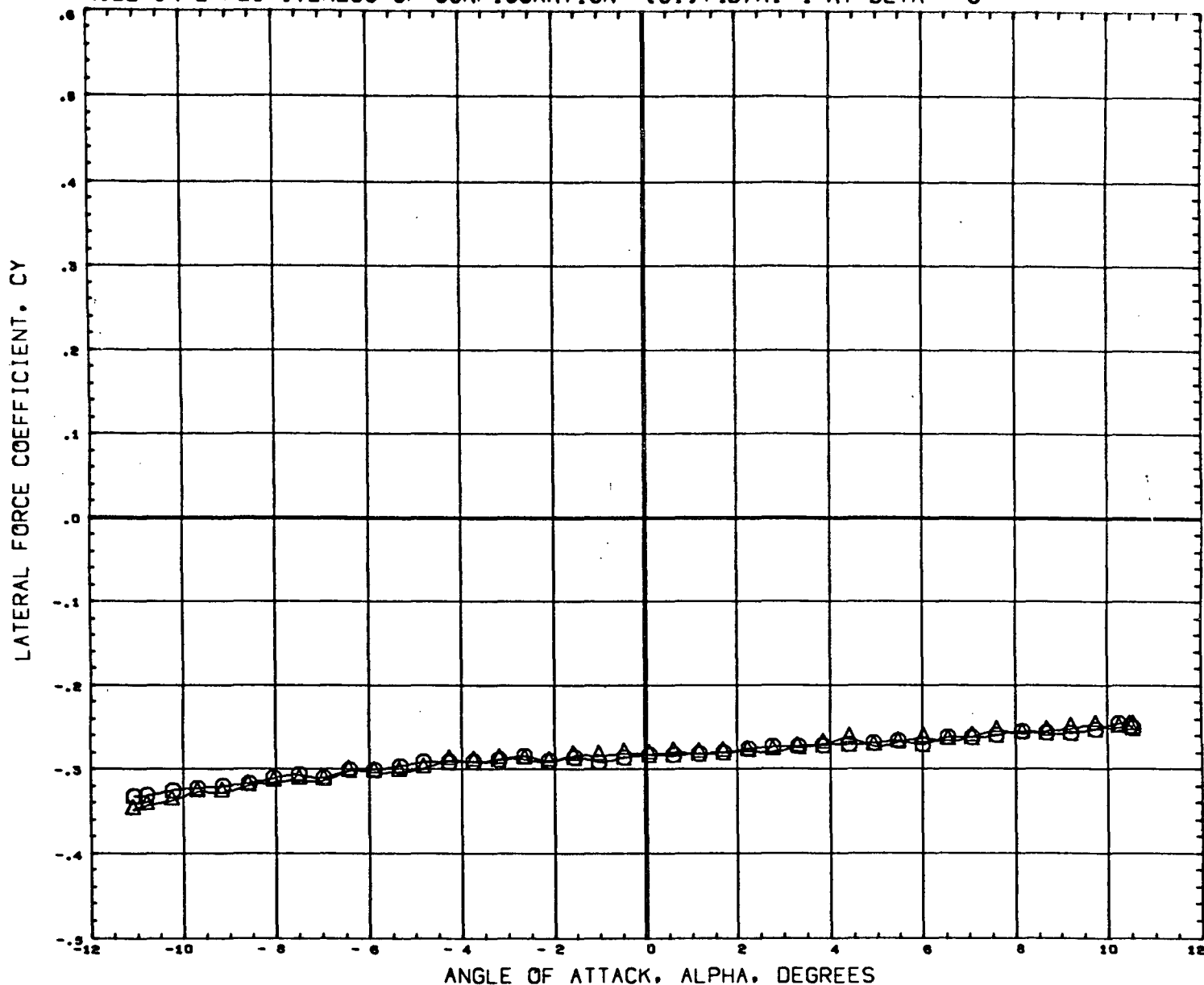
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (RD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (RD74D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 6.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 20.000 | 0.000 | LREF 609.3004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |


MACH 1.10

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AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 6



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(RD74C9)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

(RD74D3)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

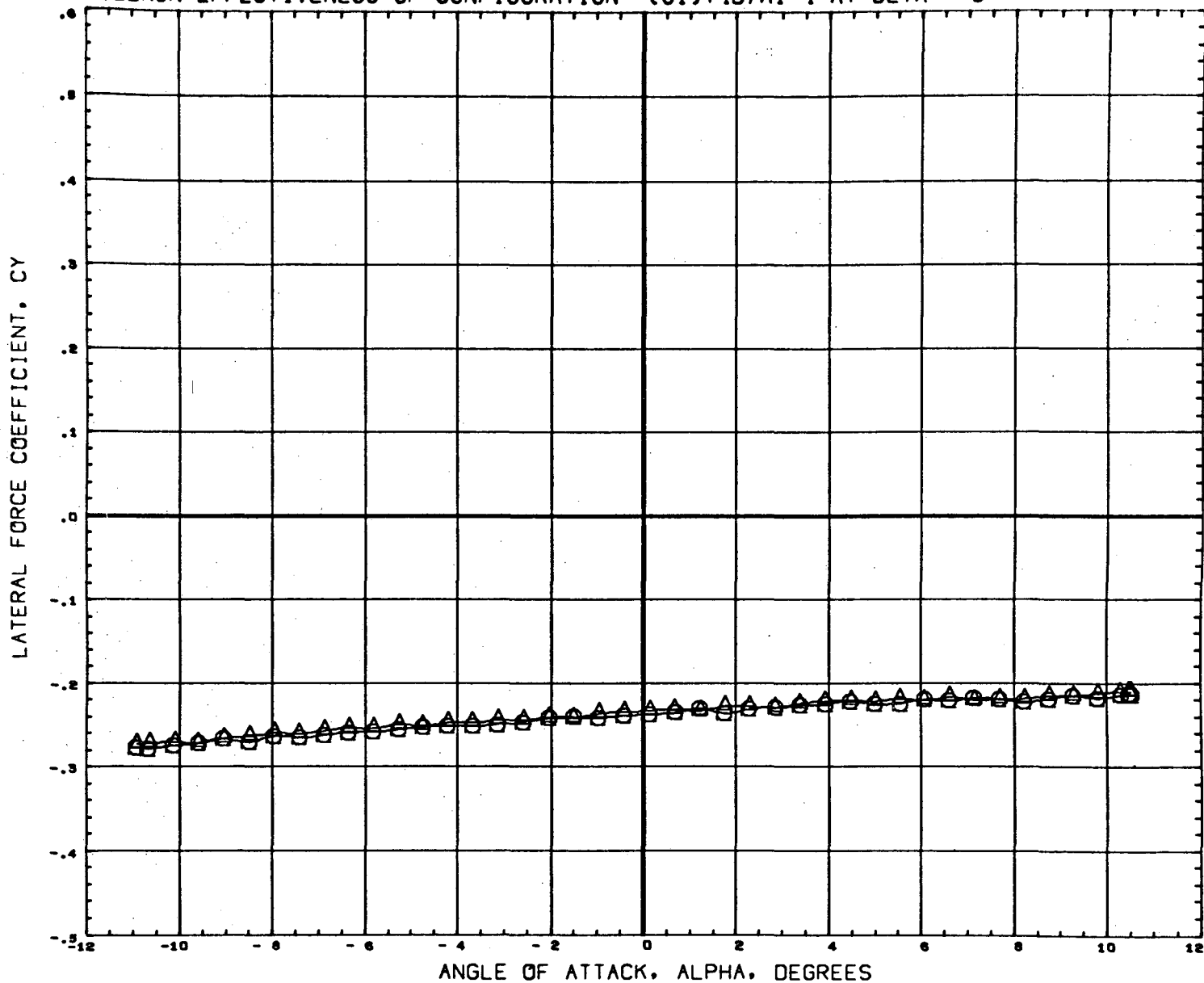
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 6.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 20.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 1.51

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AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 6



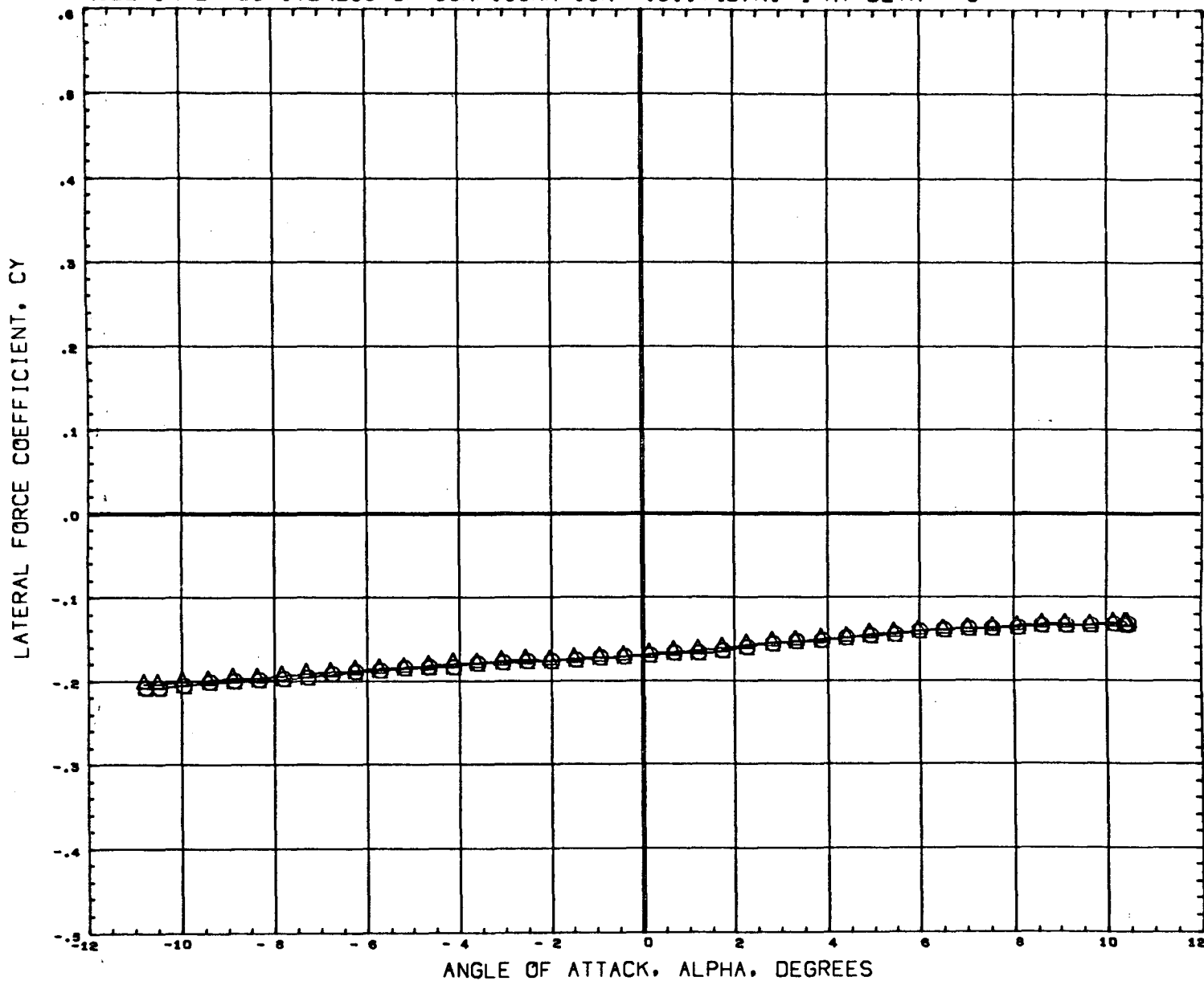
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (RD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (RD74D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 2.20

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AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 6



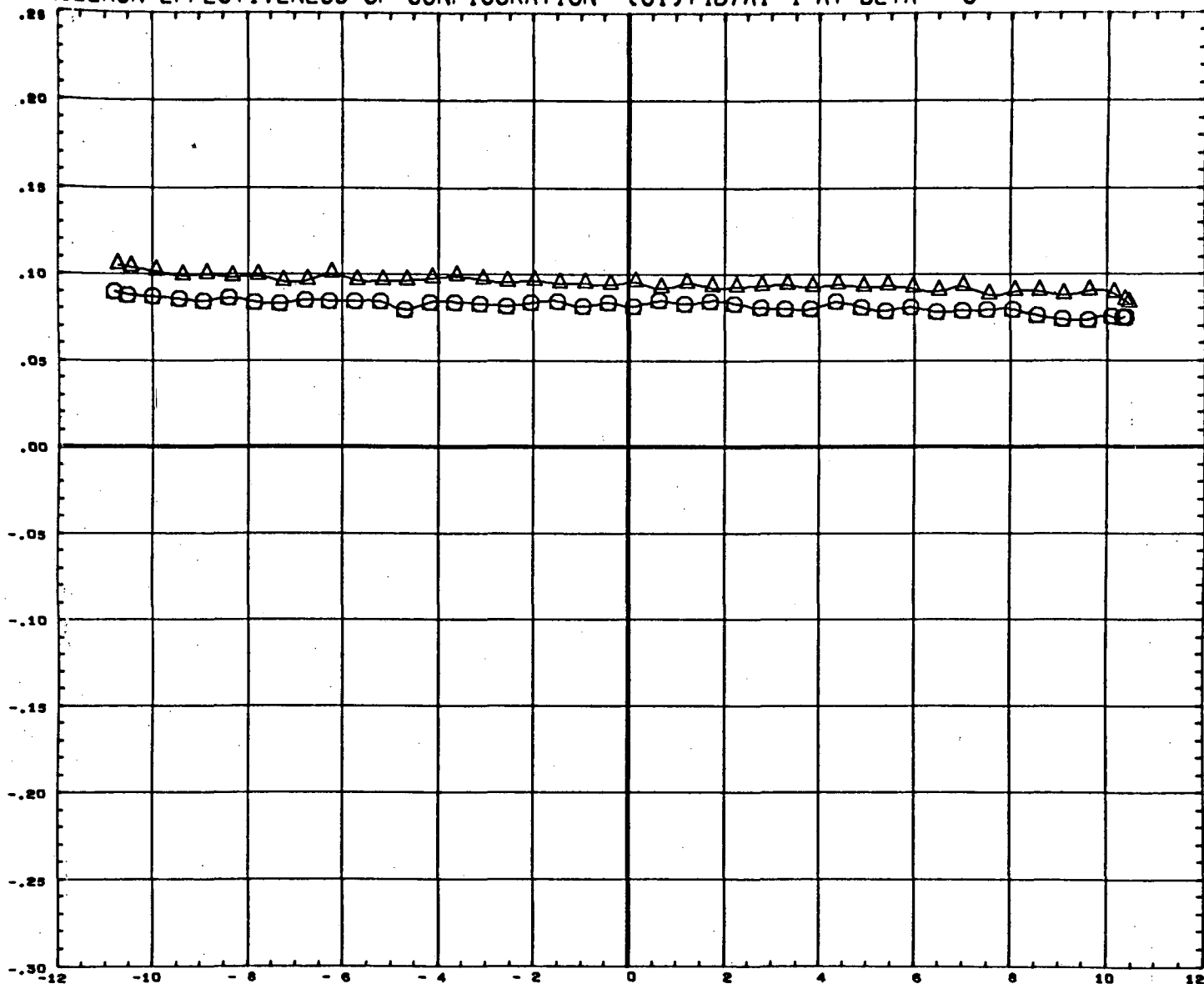
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D3) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

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AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 6

YAWING MOMENT COEFFICIENT, CYN (BODY AXIS)



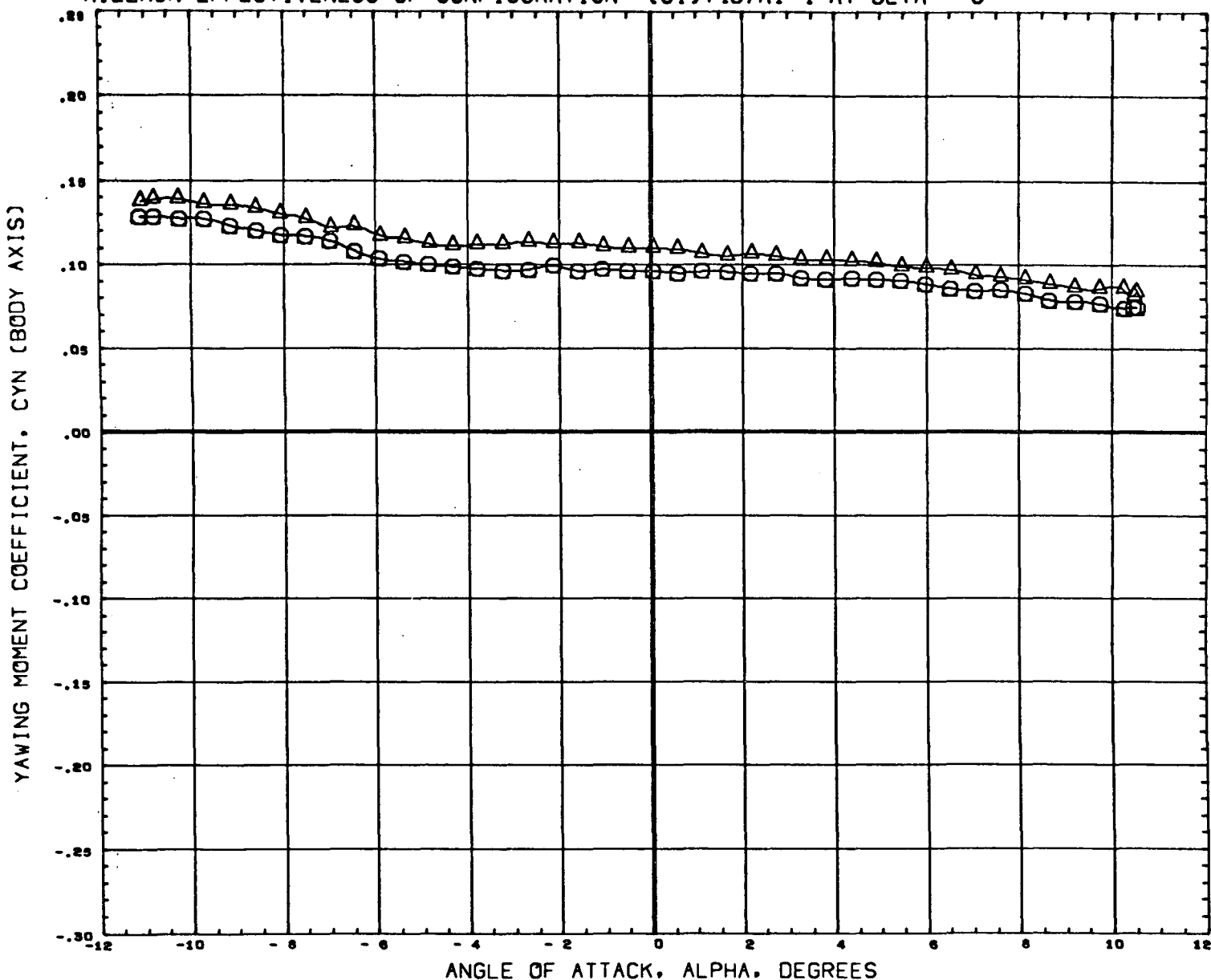
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (RD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (RD74D3) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 6.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 20.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |


MACH .58


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AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 6



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(RD74C9)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

(RD74D3)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

BETA ELEVTR AILRON RUDDER

6.000 0.000 0.000 0.000

6.000 0.000 20.000 0.000

REFERENCE INFORMATION

SREF 3155.3040 SQ.FT.

LREF 609.3004 IN.

BREF 682.0004 IN.

XMRP 937.0004 IN.

YMRP 0.0000 IN.

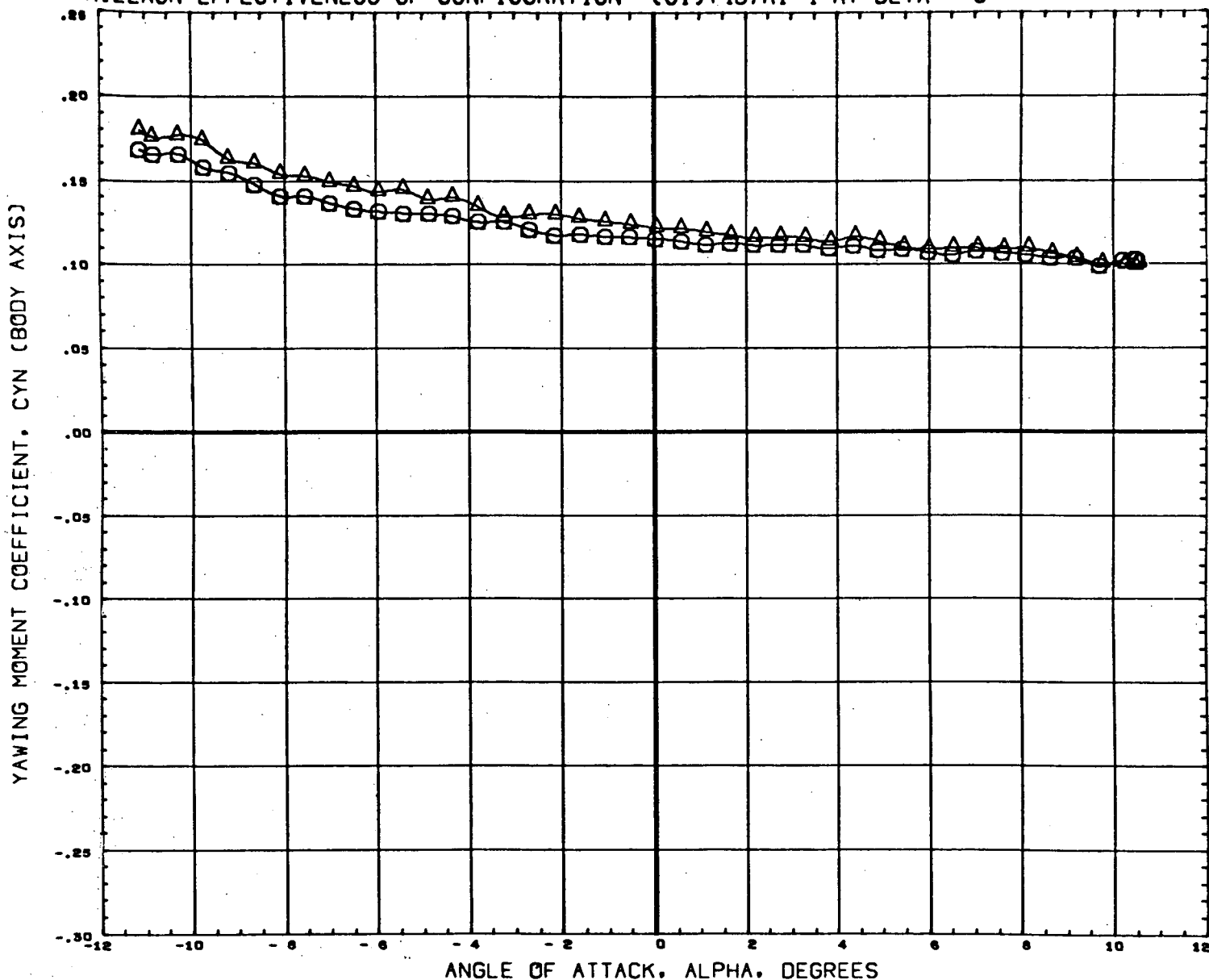
ZMRP 200.0004 IN.

SCALE 0.0060 SCALE

MACH .90

PAGE 118

AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 6

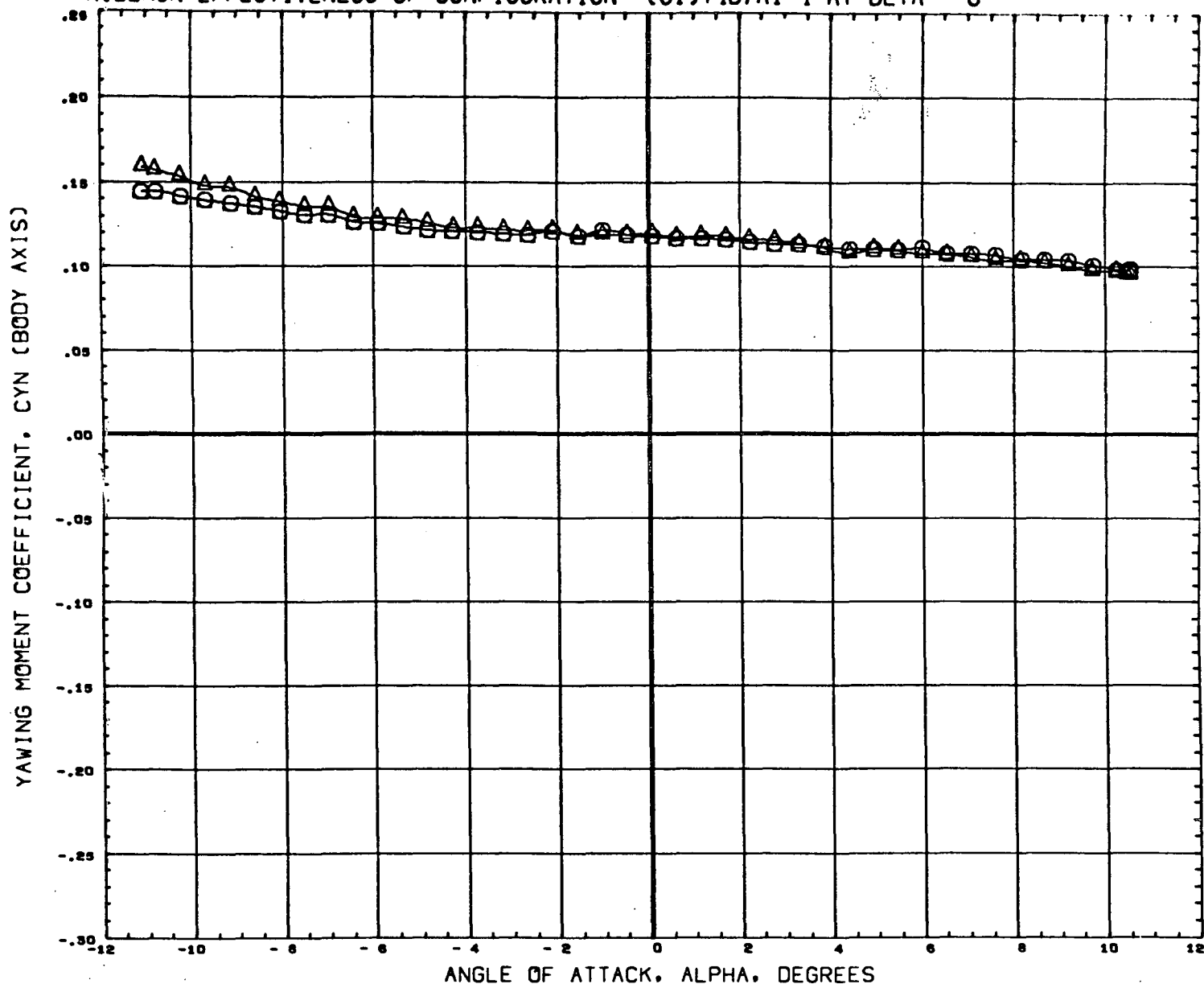


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRF | 557.0004 IN. |
| | | | | | | YMRF | 0.0000 IN. |
| | | | | | | ZMRF | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.10

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AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 6



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRR | 557.0004 IN. |
| | | | | | | YMRR | 0.0000 IN. |
| | | | | | | ZMRR | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

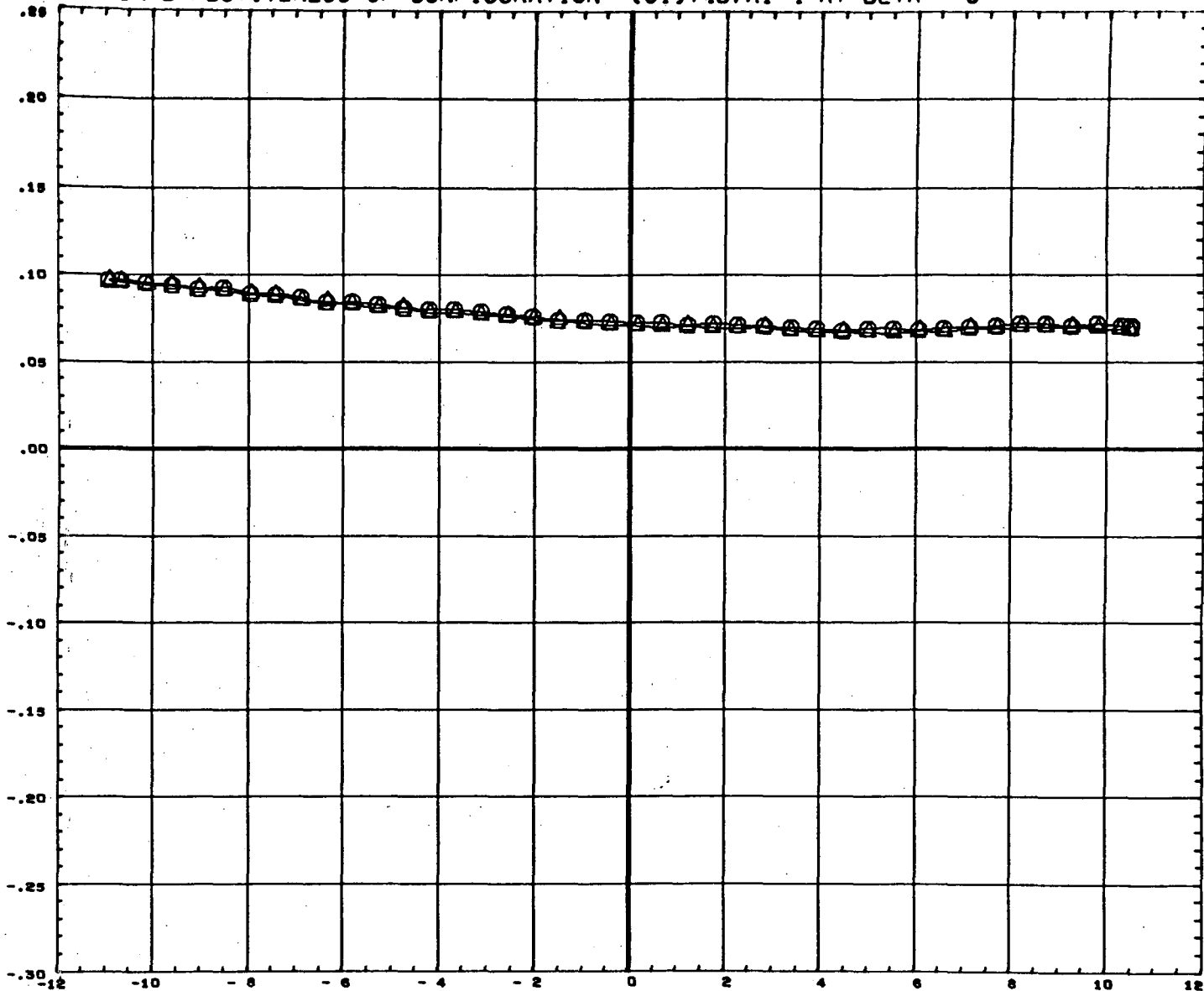
MACH

1.51

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AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 6

YAWING MOMENT COEFFICIENT, CYN (BODY AXIS)



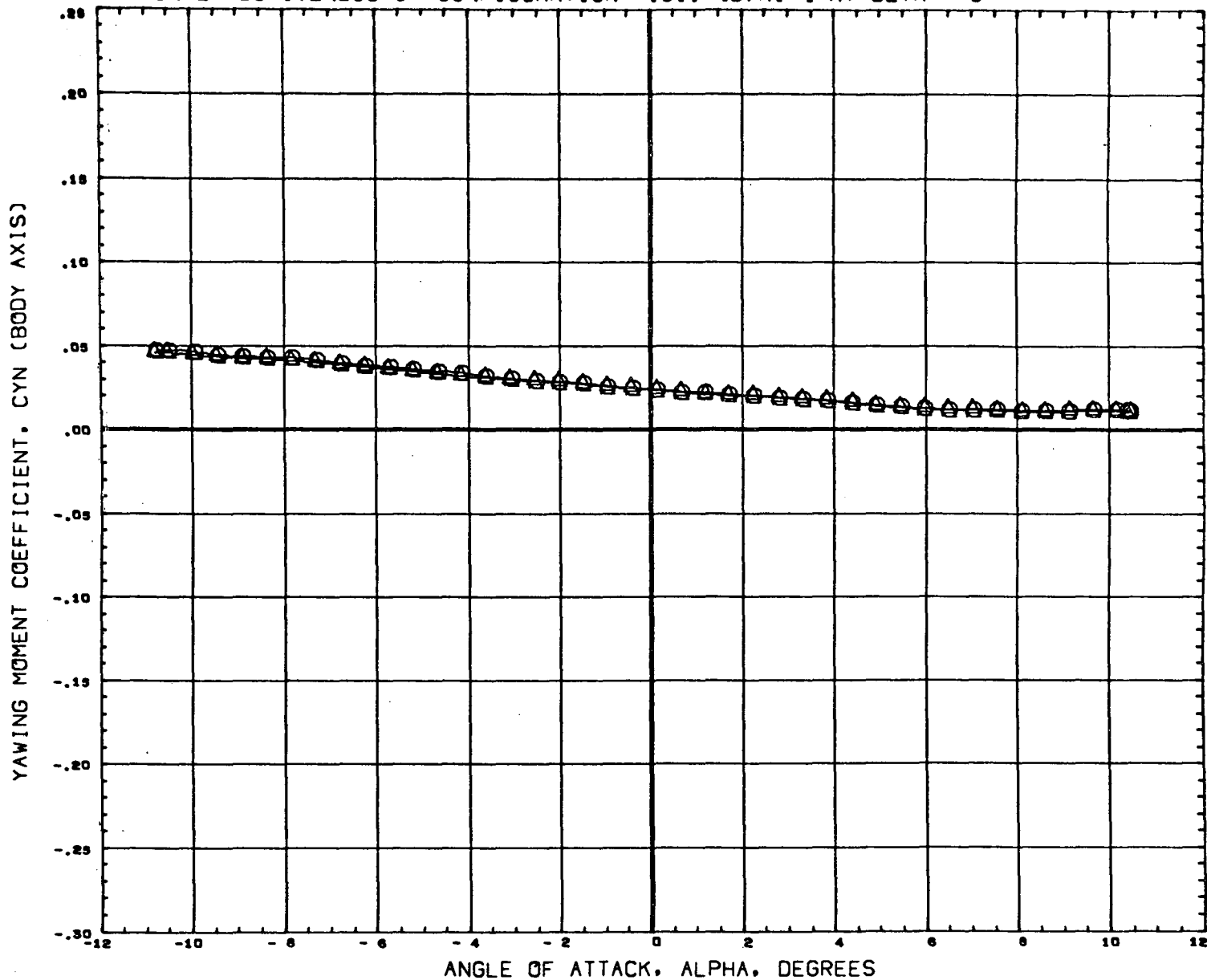
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (RD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (RD74D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 6.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 20.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH 2.20

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AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 6



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (RD74C9) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (RD74D3) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

BETA ELEVTR AILERON RUDDER
 6.000 0.000 0.000 0.000
 6.000 0.000 20.000 0.000

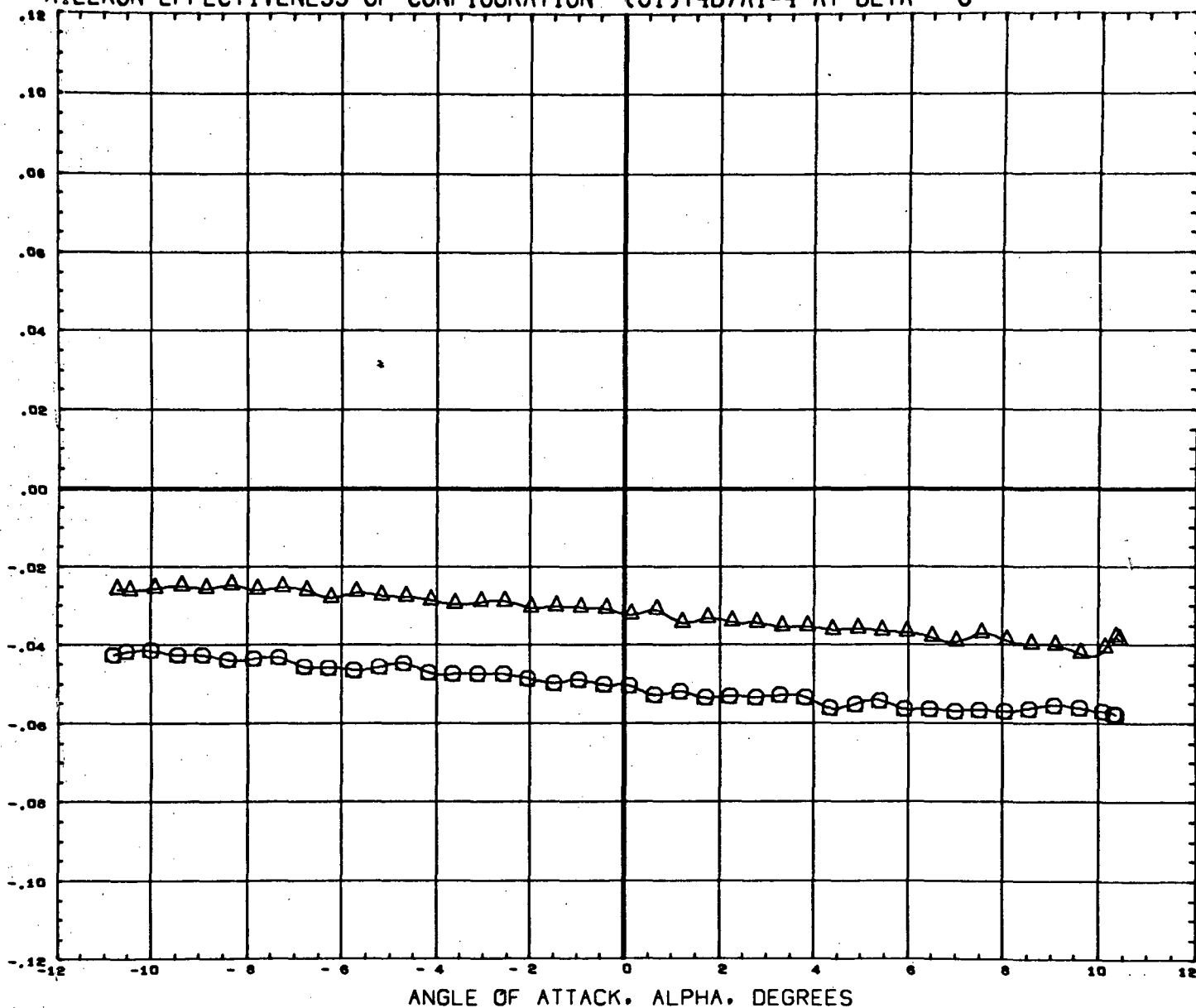
REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH 4.47

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AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 6

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(RD74C9) (RD74D3) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

BETA ELEVTR AILRON RUDDER
6.000 0.000 0.000 0.000
6.000 0.000 20.000 0.000

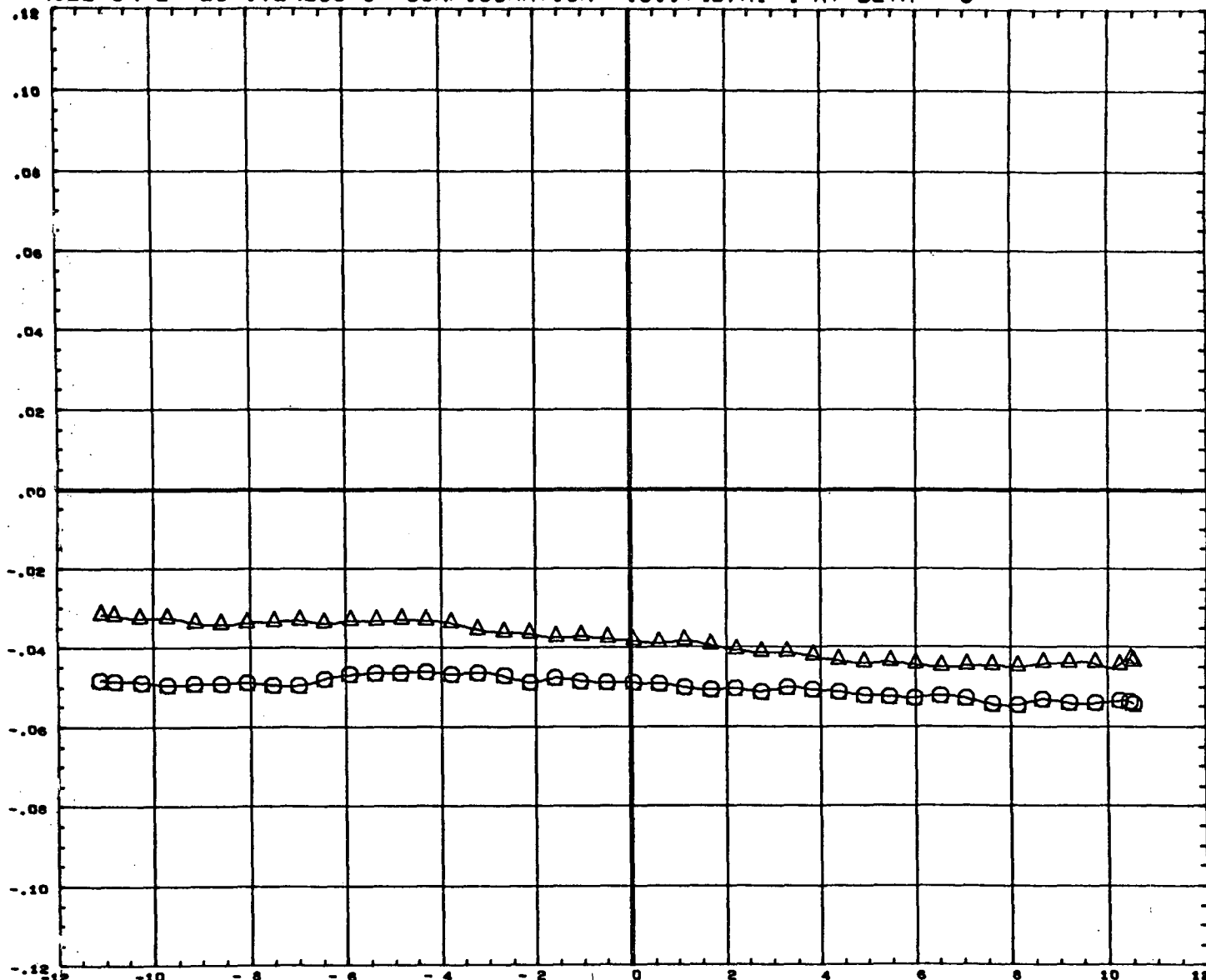
REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060 SCALE

MACH .58

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AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 6

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



ANGLE OF ATTACK, ALPHA, DEGREES

| DATA SET | SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|----------|--------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C9) | ○ | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D3) | △ | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | | BREF | 662.0004 IN. |
| | | | | | | | XMRP | 557.0004 IN. |
| | | | | | | | YMRP | 0.0000 IN. |
| | | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | | SCALE | 0.0060 SCALE |

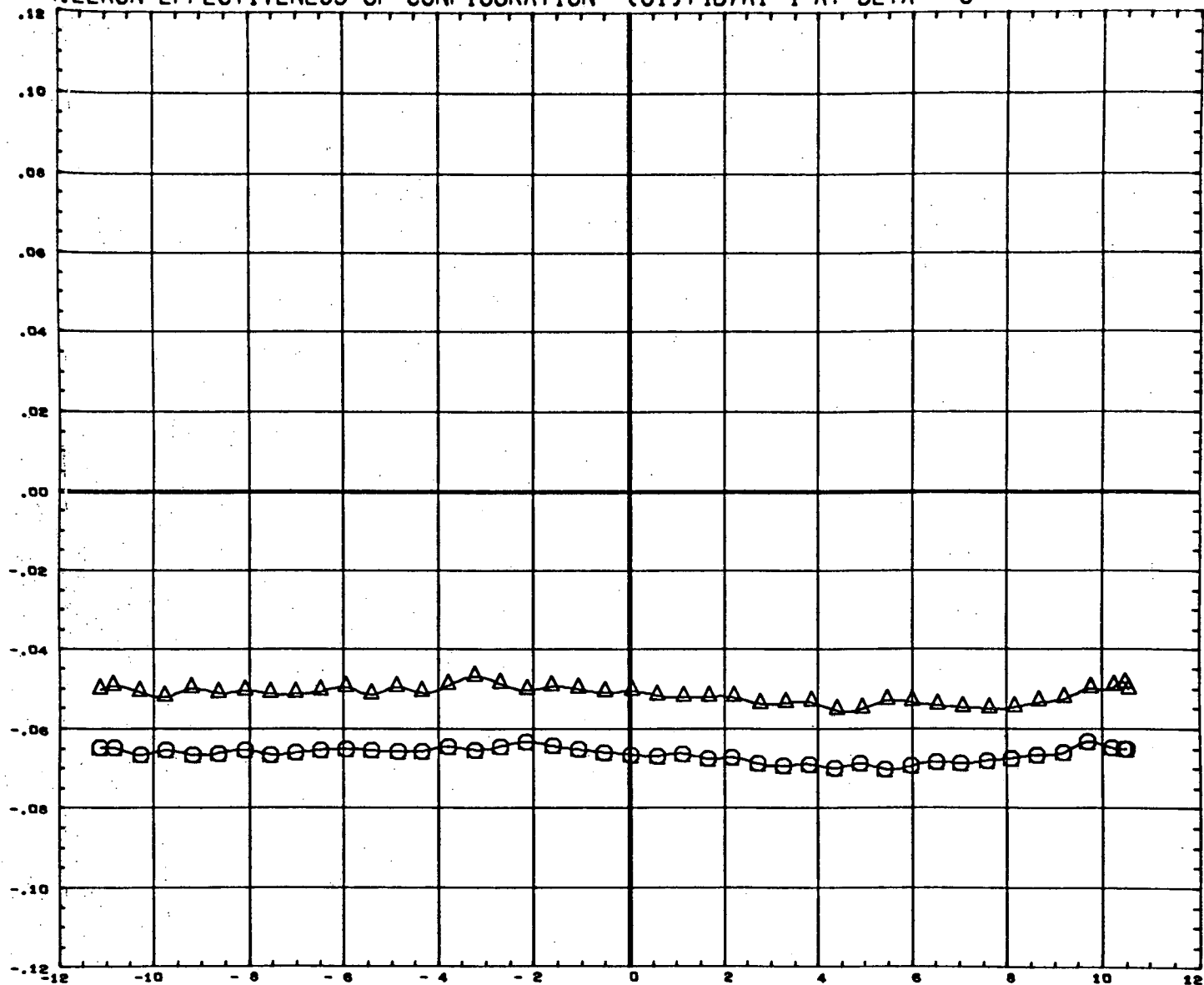
MACH

.90

PAGE 124

AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 6

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



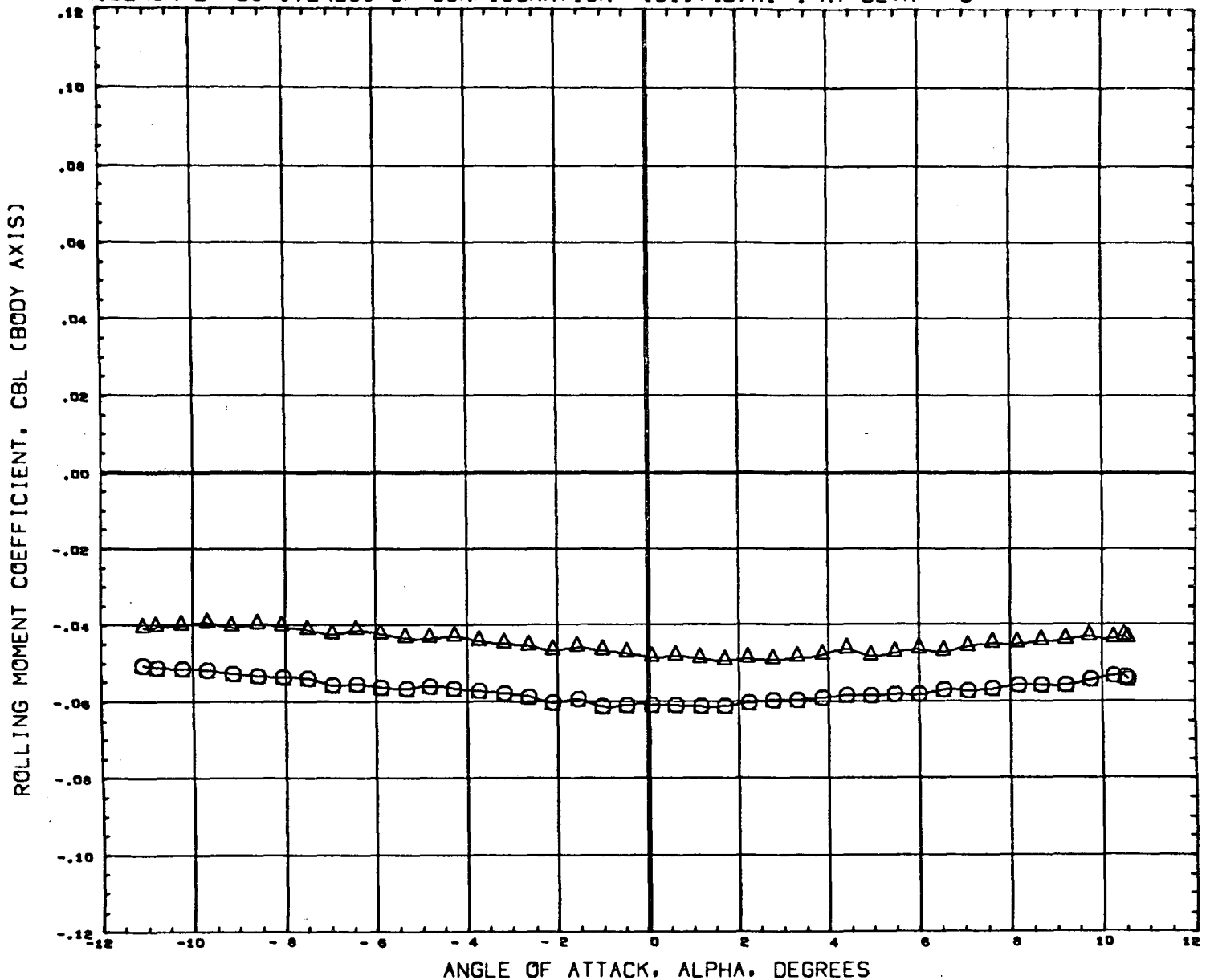
ANGLE OF ATTACK, ALPHA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D3) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.10

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AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 6



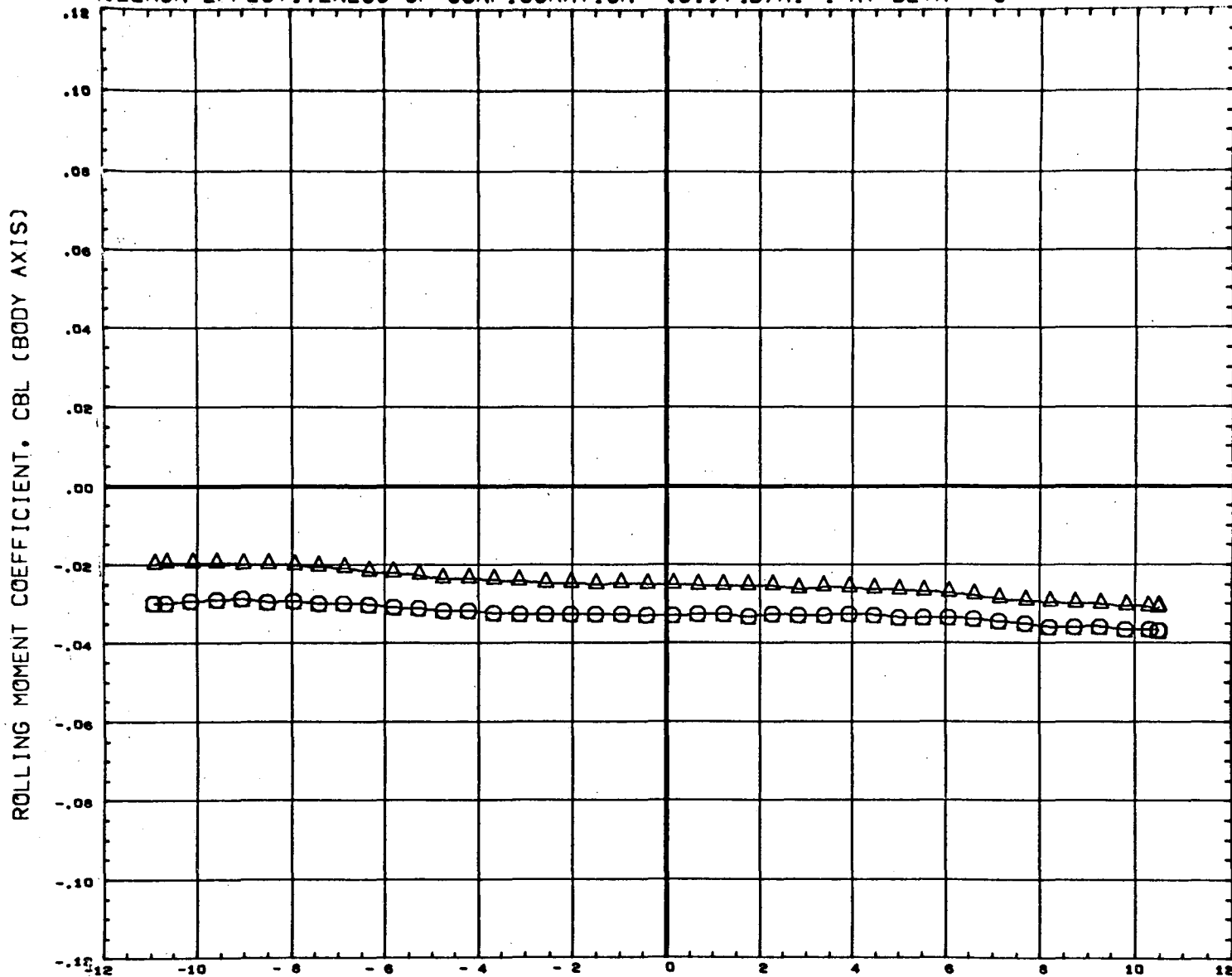
DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (RD74C9)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (RD74D3)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 862.0004 IN. |
| | | | | XMRP | 957.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 1.51

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AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 6

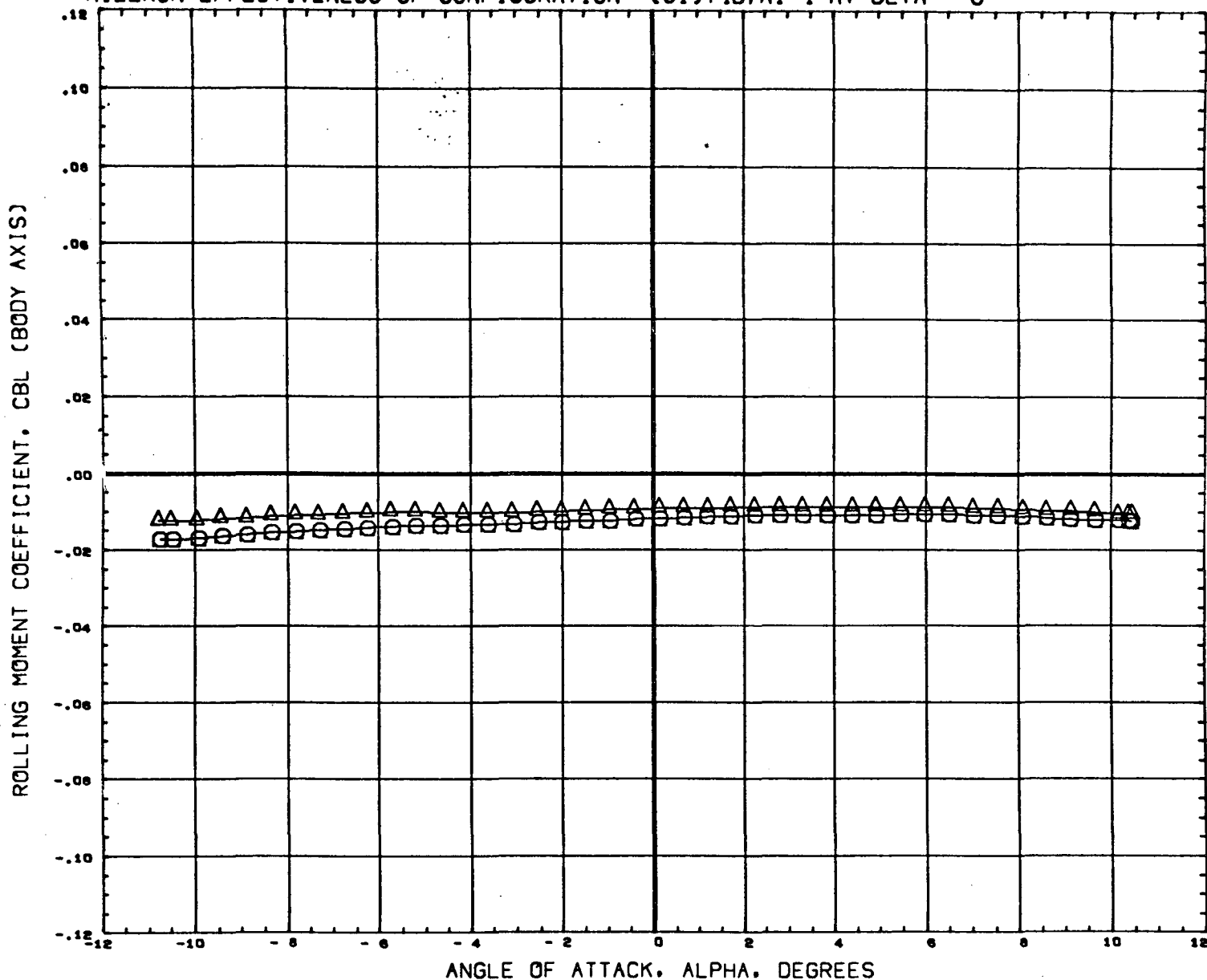


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

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AILERON EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT BETA = 6



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(RD74C9) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

(RD74D3) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 6.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 20.000 | 0.000 |

REFERENCE INFORMATION

| | | |
|-------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

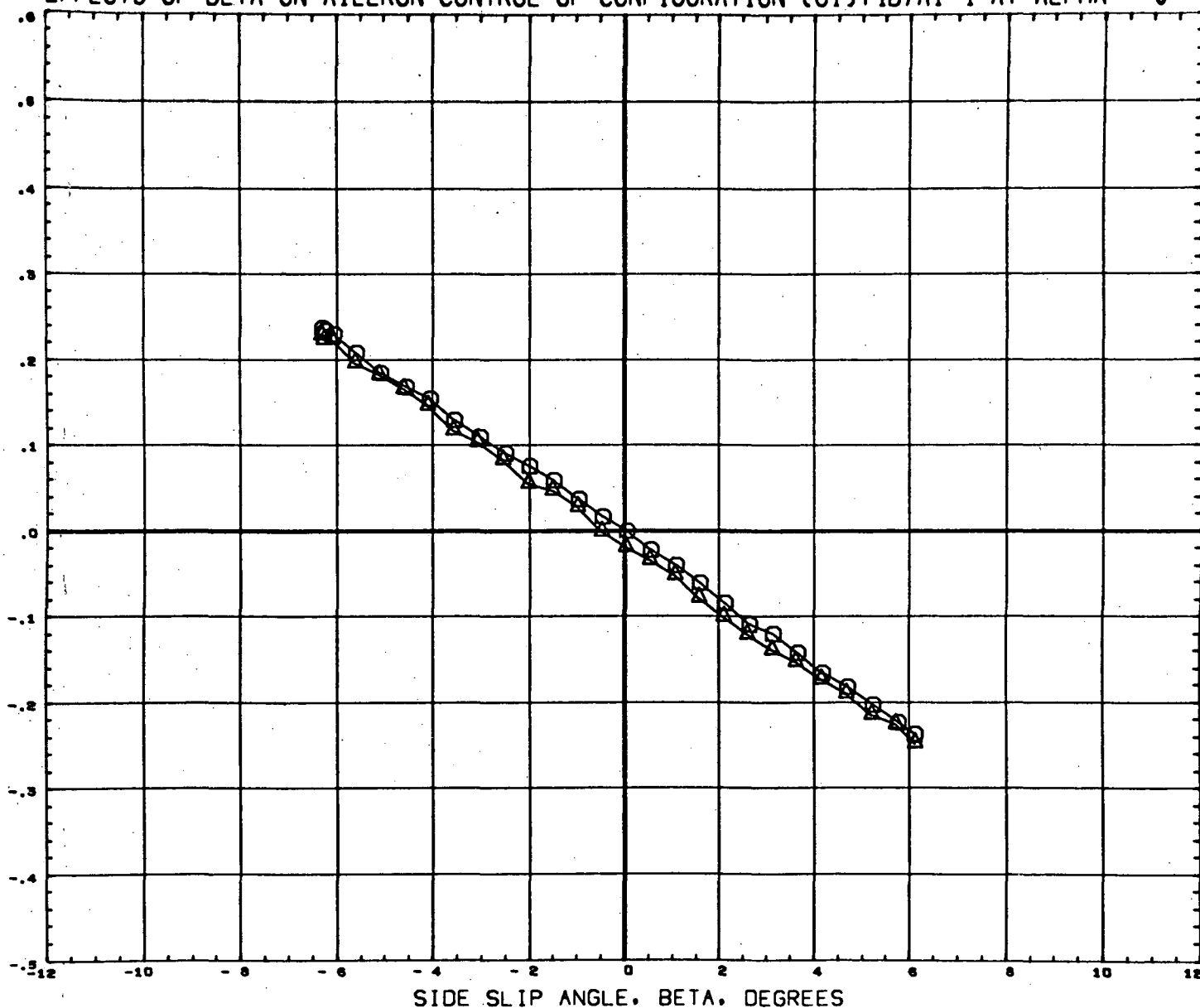
MACH

4.47



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EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

LATERAL FORCE COEFFICIENT, CY



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C8)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
(RD74D2)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 20.000 | 0.000 |

REFERENCE INFORMATION

| | | |
|-------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 862.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

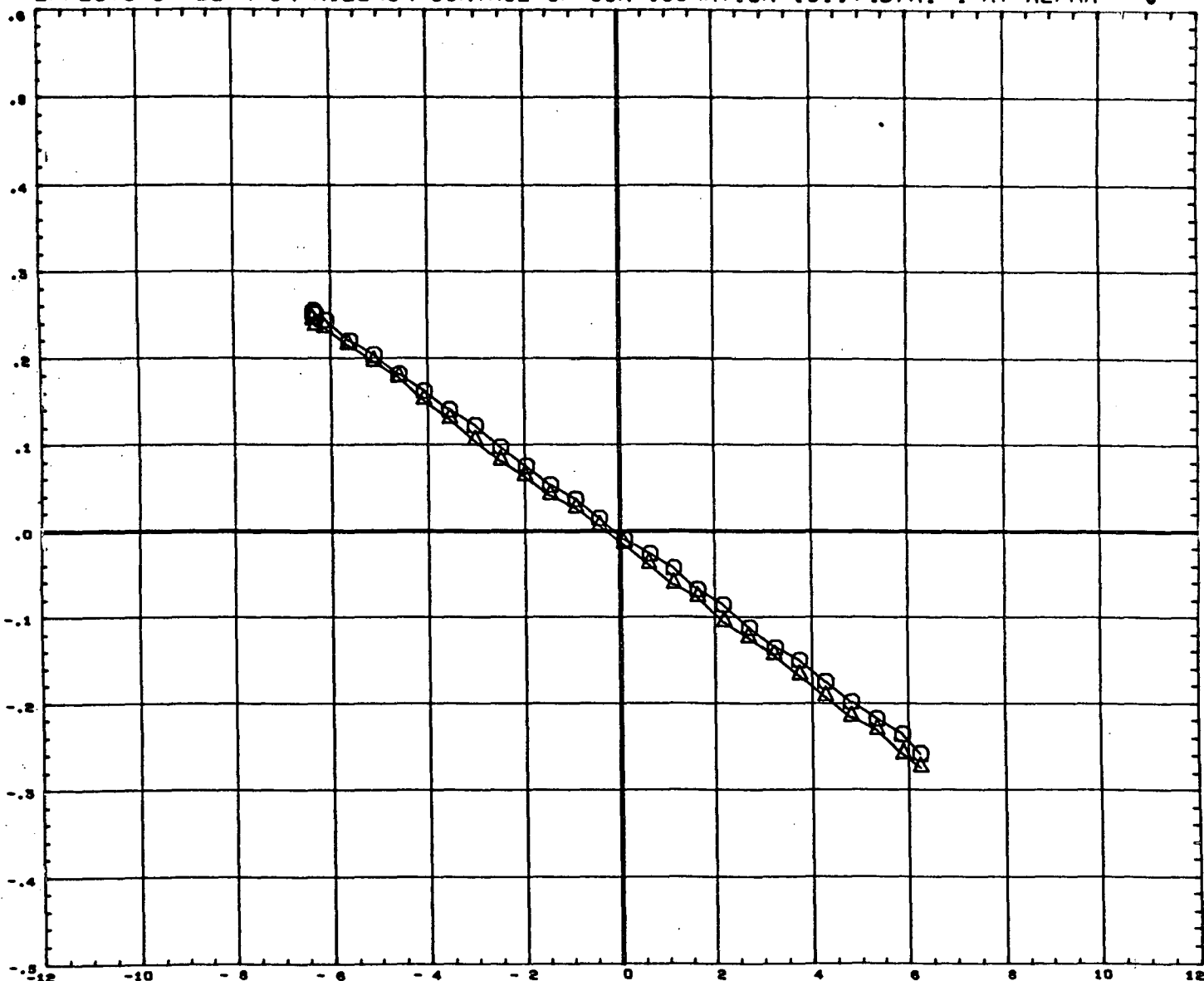
MACH

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EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

LATERAL FORCE COEFFICIENT, CY



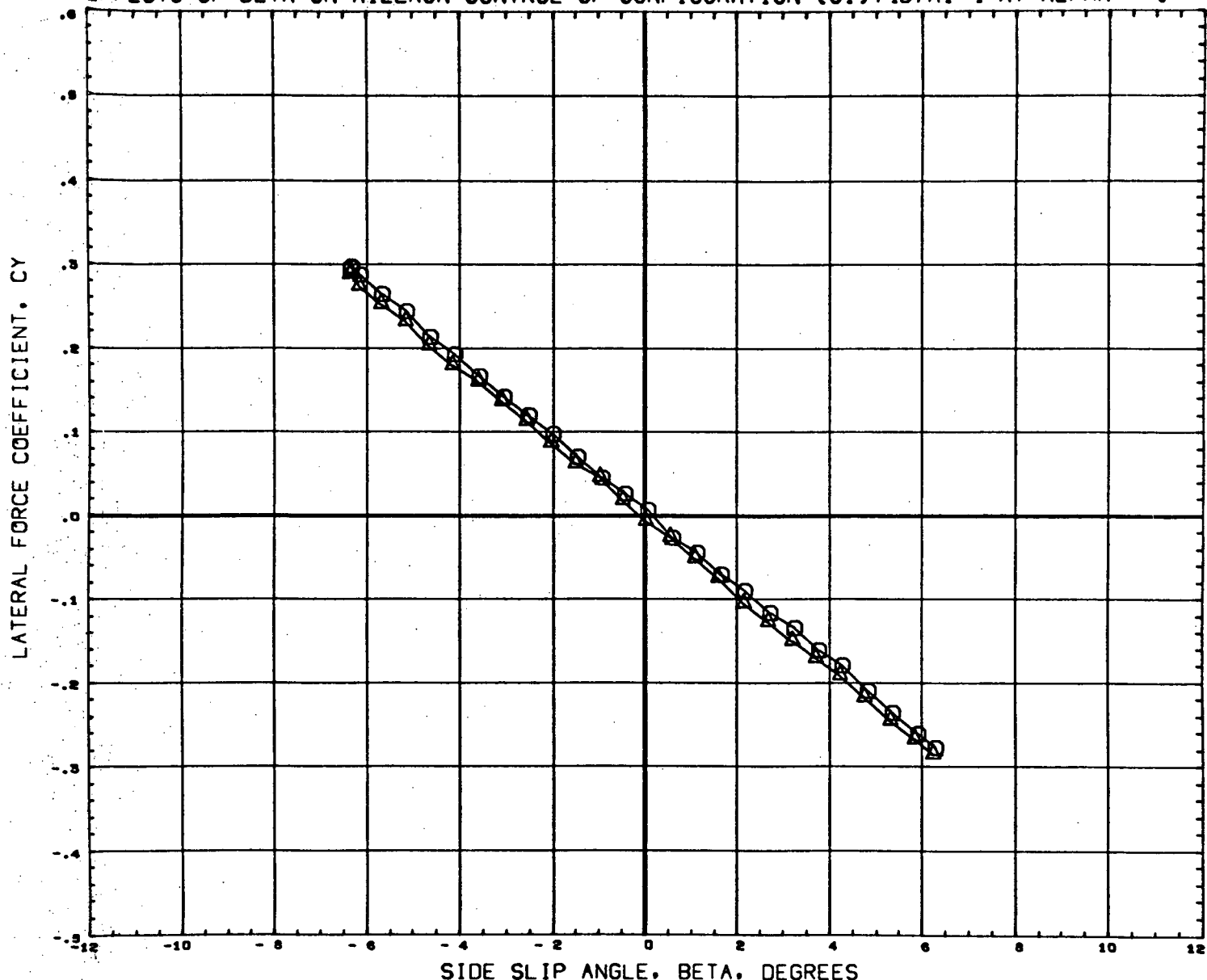
SIDE SLIP ANGLE, BETA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D2) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 682.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0080 SCALE |

MACH .90

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EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0



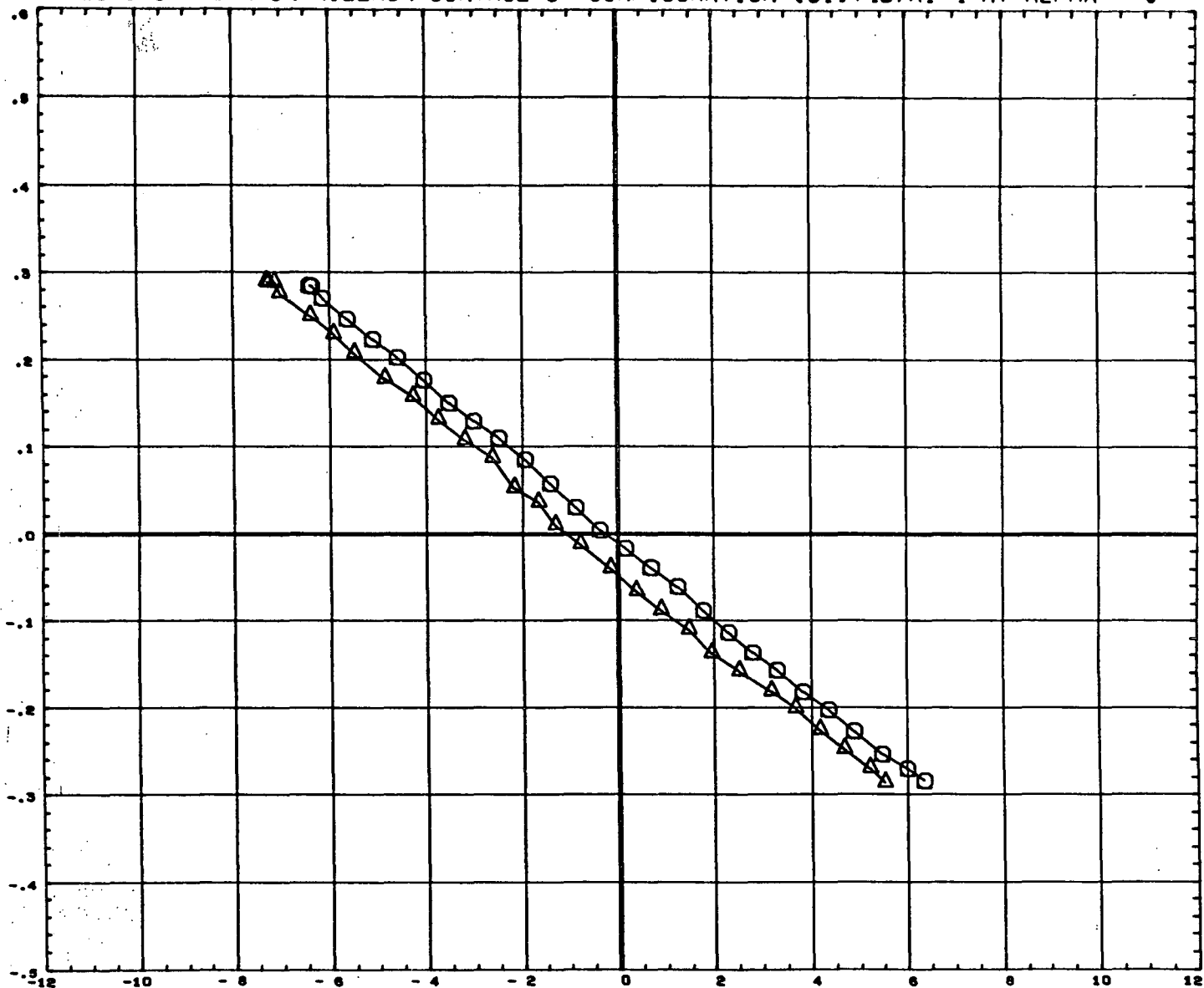
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|---------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D2) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | -20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

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EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

LATERAL FORCE COEFFICIENT, CY



SIDE SLIP ANGLE, BETA, DEGREES

DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C8) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (RD74D2) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 20.000 | 0.000 |

| REFERENCE INFORMATION | |
|-----------------------|------------------|
| SREF | 3155.3040 SQ.FT. |
| LREF | 609.5004 IN. |
| BREF | 882.0004 IN. |
| XMRP | 557.0004 IN. |
| YMRP | 0.0000 IN. |
| ZMRP | 200.0004 IN. |
| SCALE | 0.0060 SCALE |

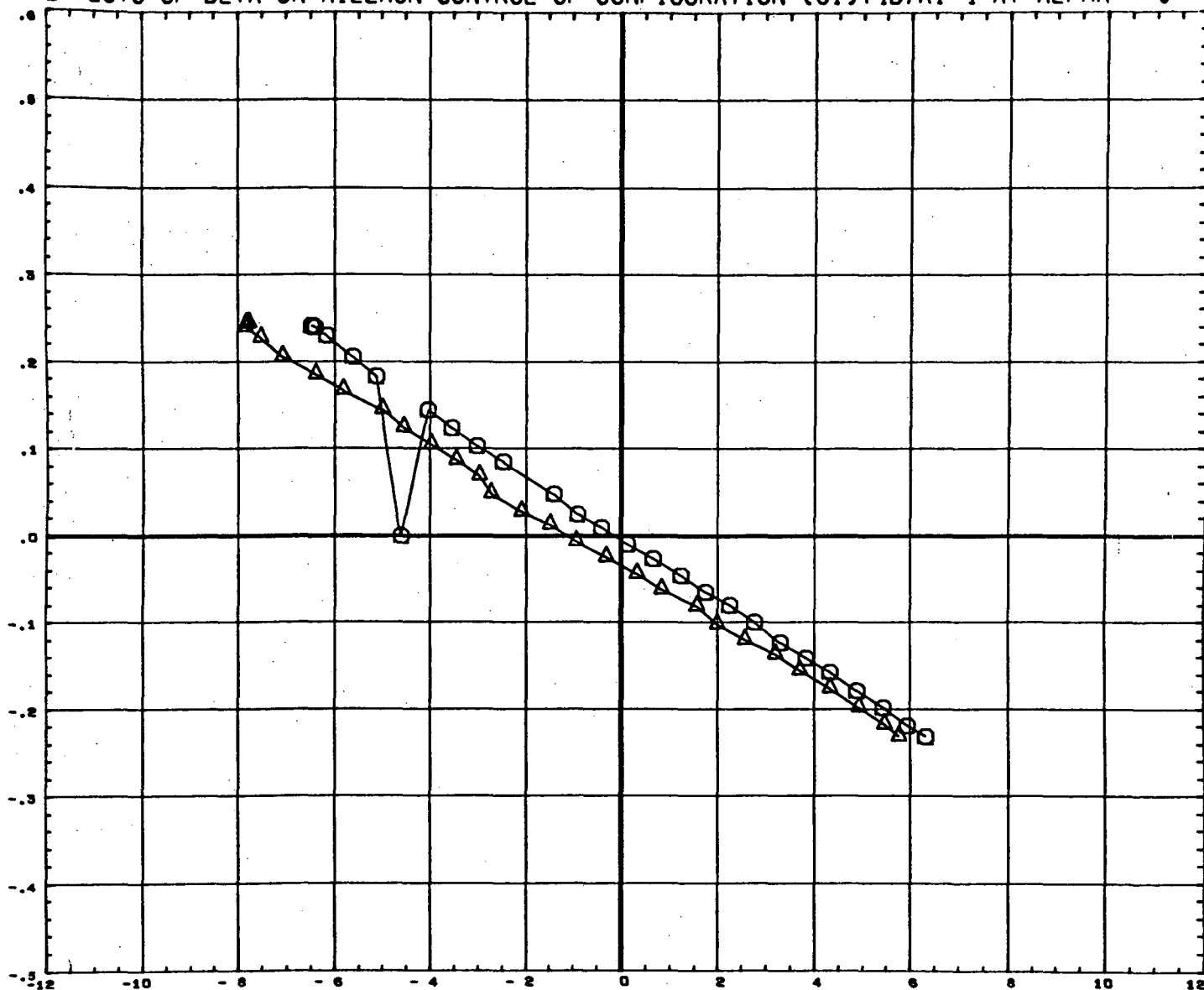
MACH

1.51

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EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

LATERAL FORCE COEFFICIENT, CY



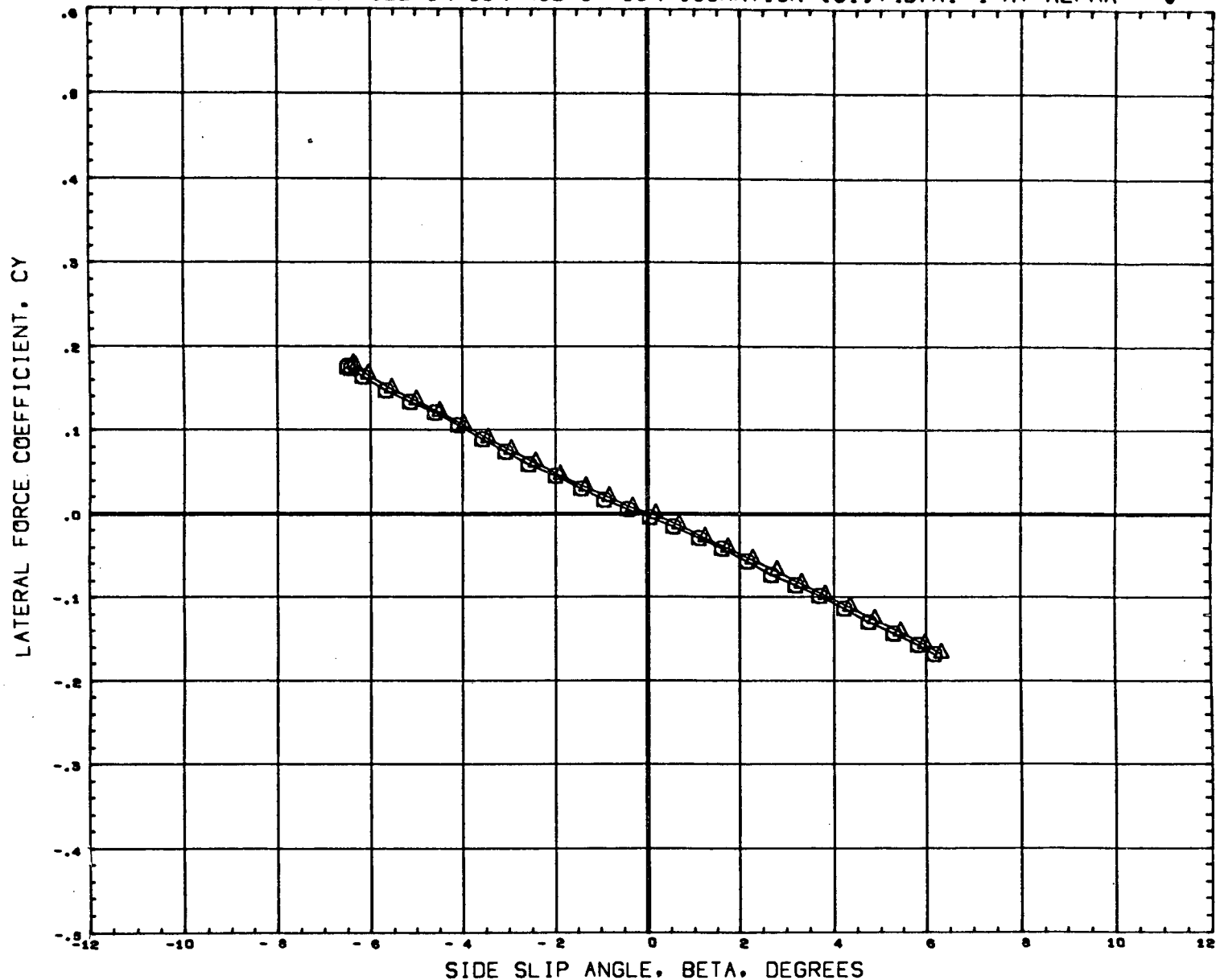
SIDE SLIP ANGLE, BETA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D2) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRF | 557.0004 IN. |
| | | | | | | YMRF | 0.0000 IN. |
| | | | | | | ZMRF | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

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EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0



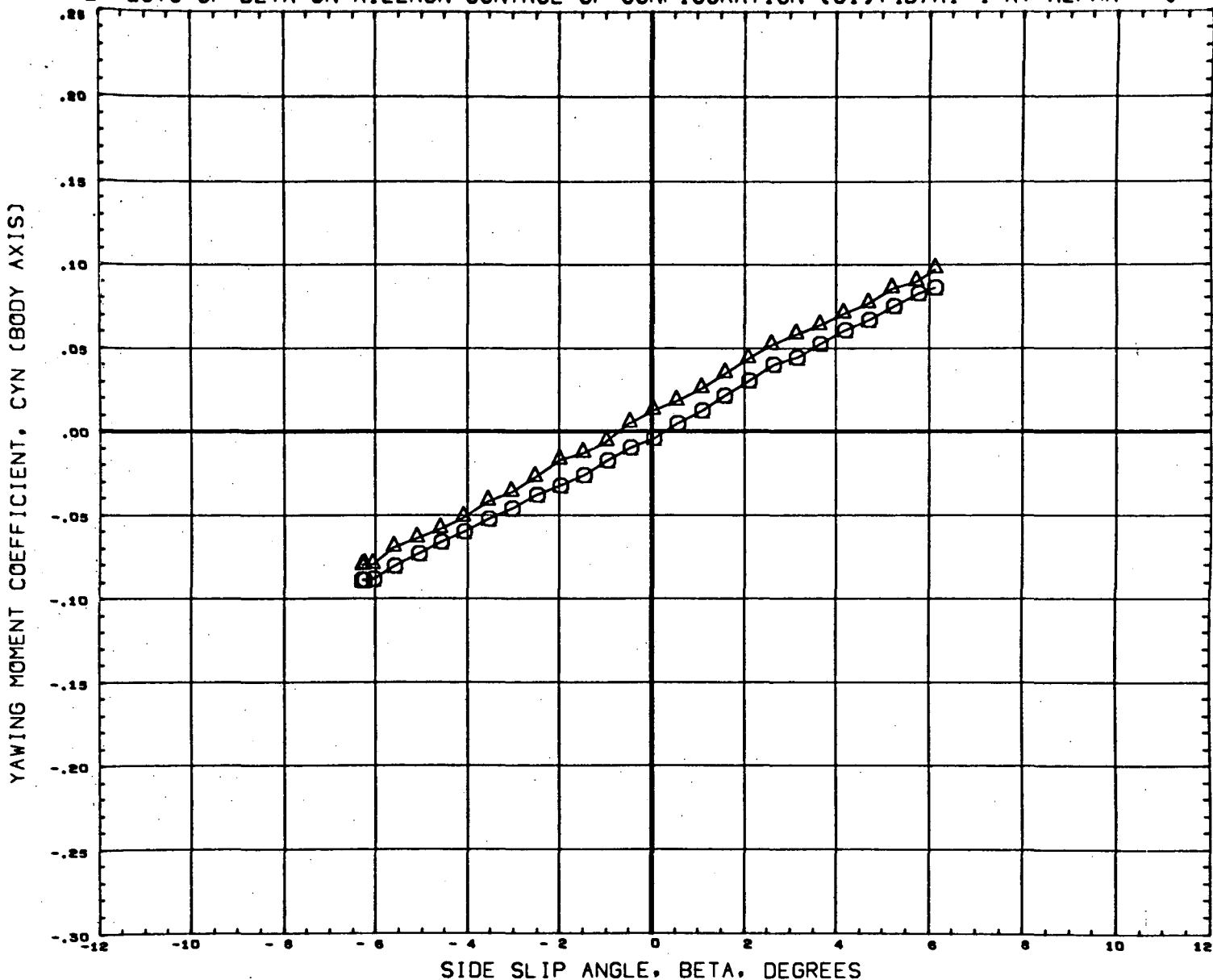
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D2) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH

4.47

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EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C8) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

(RD74D2) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 20.000 | 0.000 |

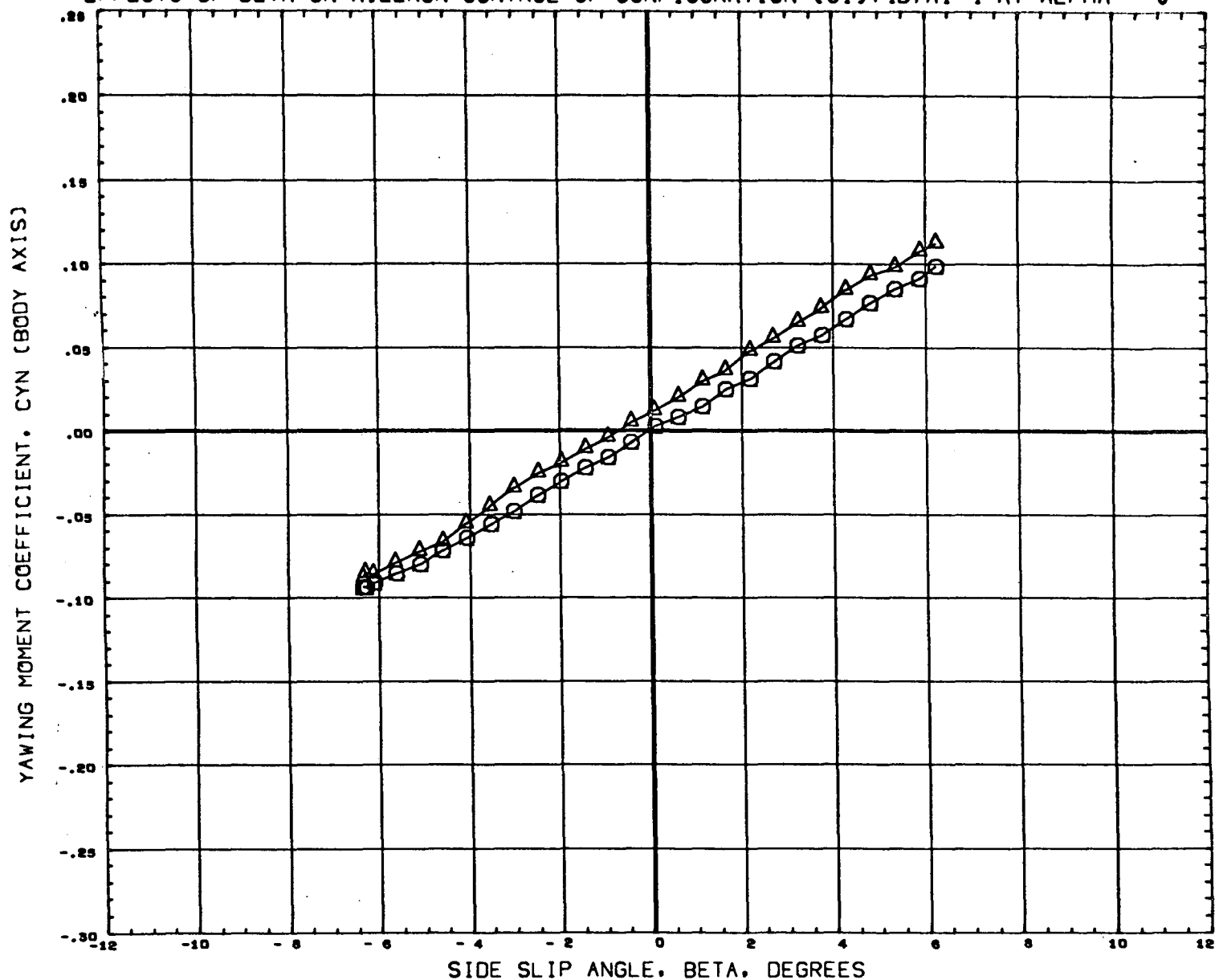
REFERENCE INFORMATION

| | | |
|-------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

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EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (O1)T4B7A1-4 AT ALPHA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 |
| (RD74D2) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 |

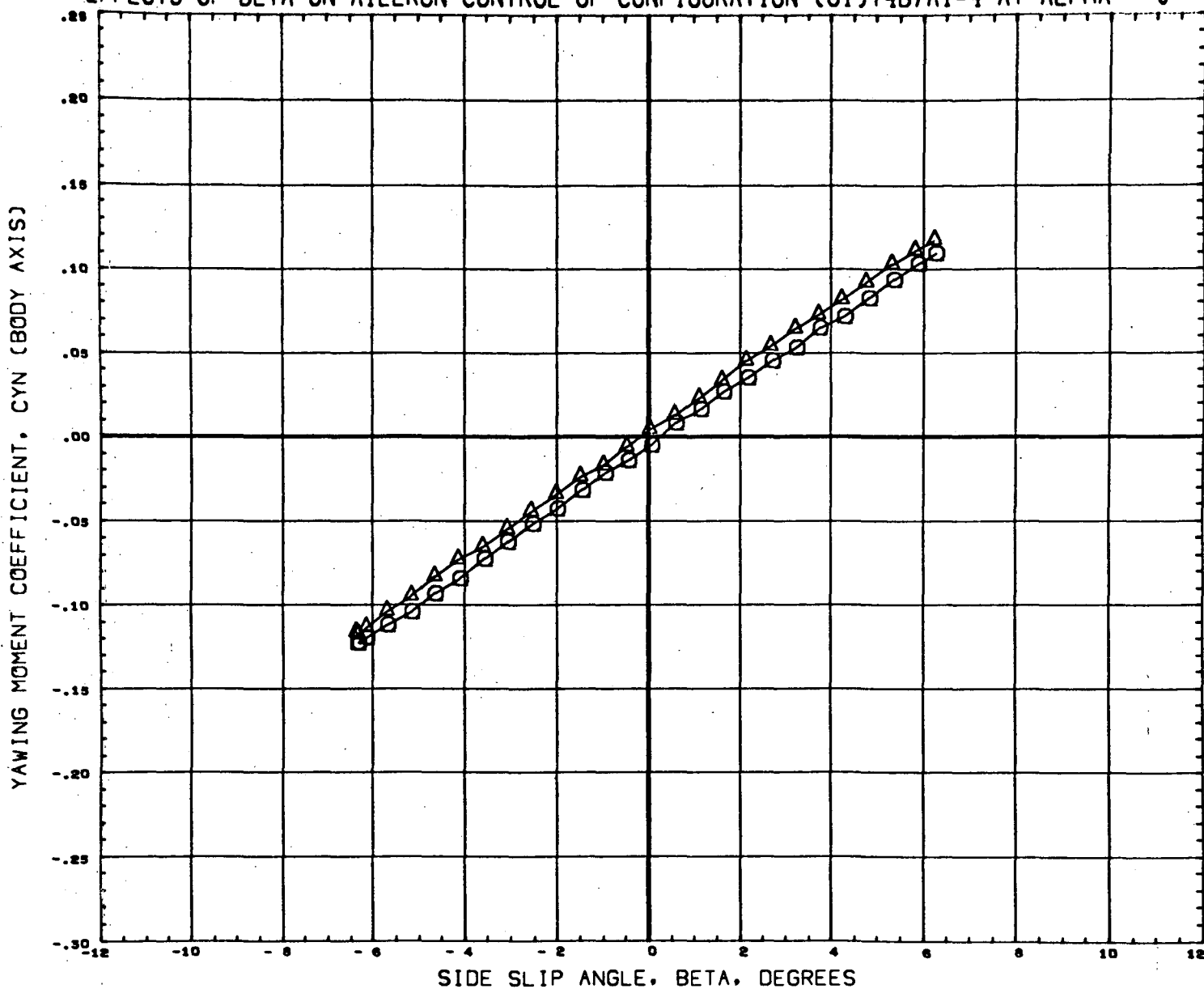
| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 20.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 862.0004 | IN. |
| XMRP | 957.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH .90

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EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

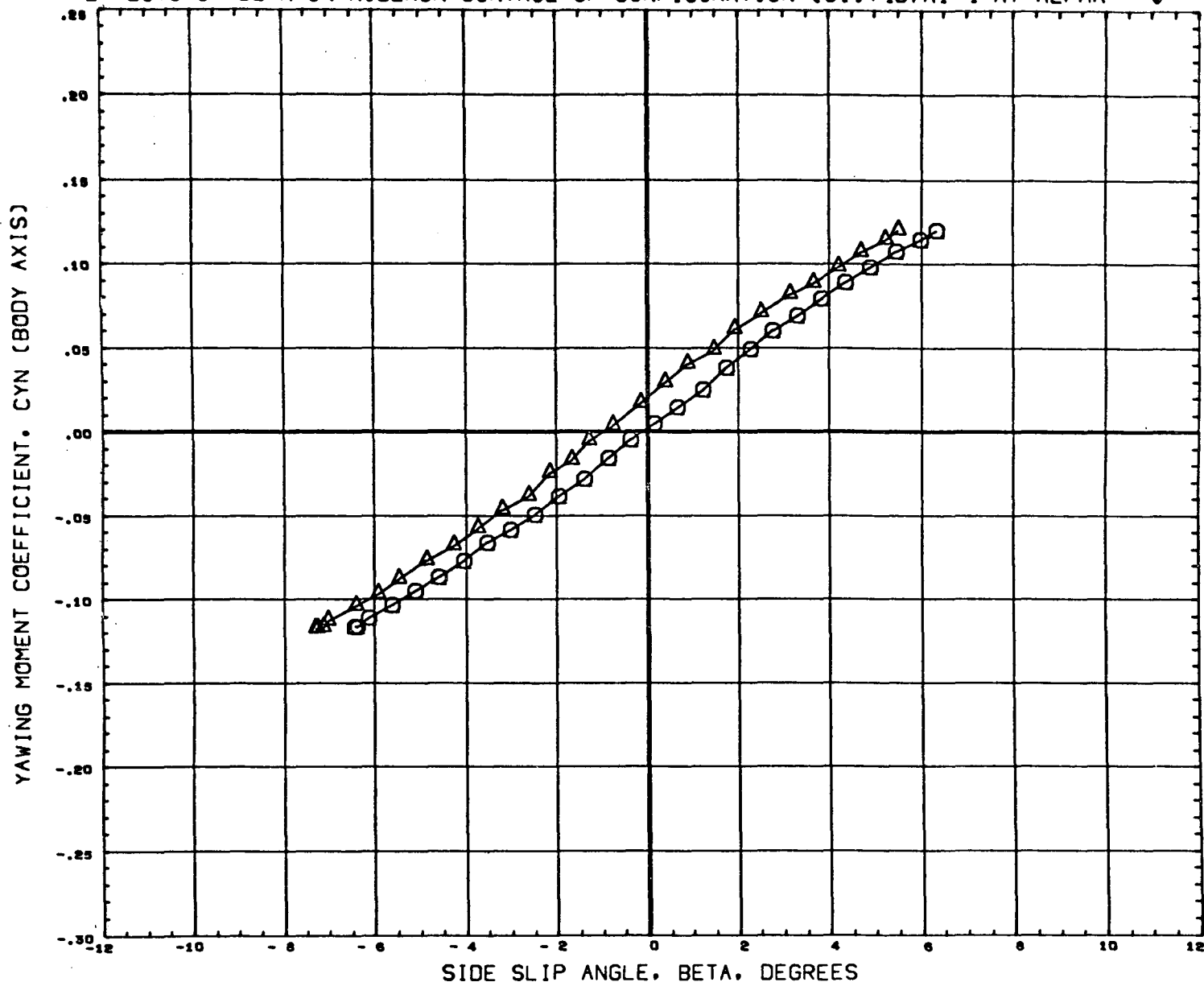
(TD74C8) \bigcirc MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (RD74D2) \triangle MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-------|--------|--------|--------|-----------------------|-----------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | BREF | 882.0004 | IN. |
| | | | | XMRP | 937.0004 | IN. |
| | | | | YMRP | 0.0000 | IN. |
| | | | | ZMRP | 200.0004 | IN. |
| | | | | SCALE | 0.0060 | SCALE |

MACH 1.08

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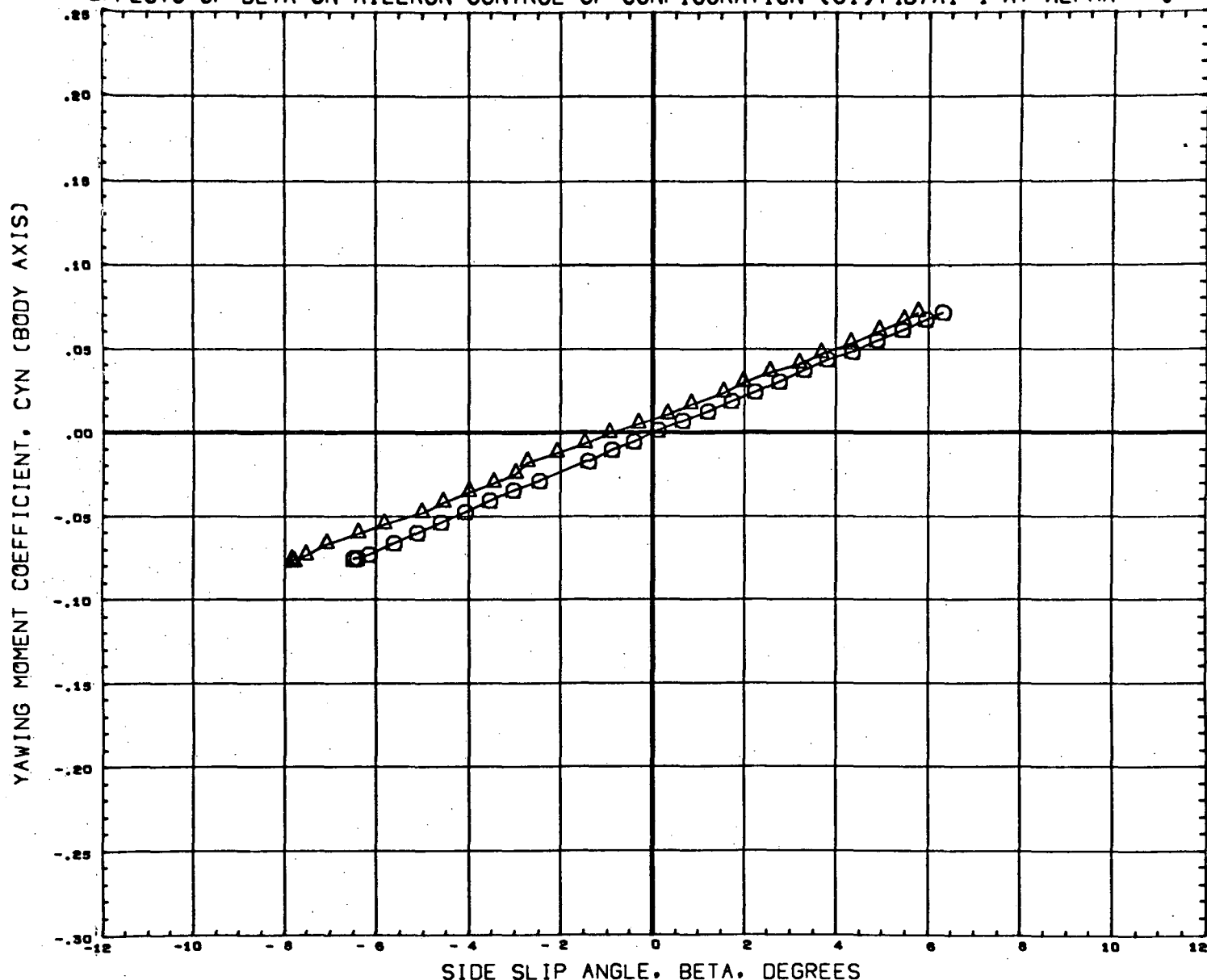
EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D2) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRRP | 557.0004 IN. |
| | | | | | | YMRRP | 0.0000 IN. |
| | | | | | | ZMRRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.51

EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

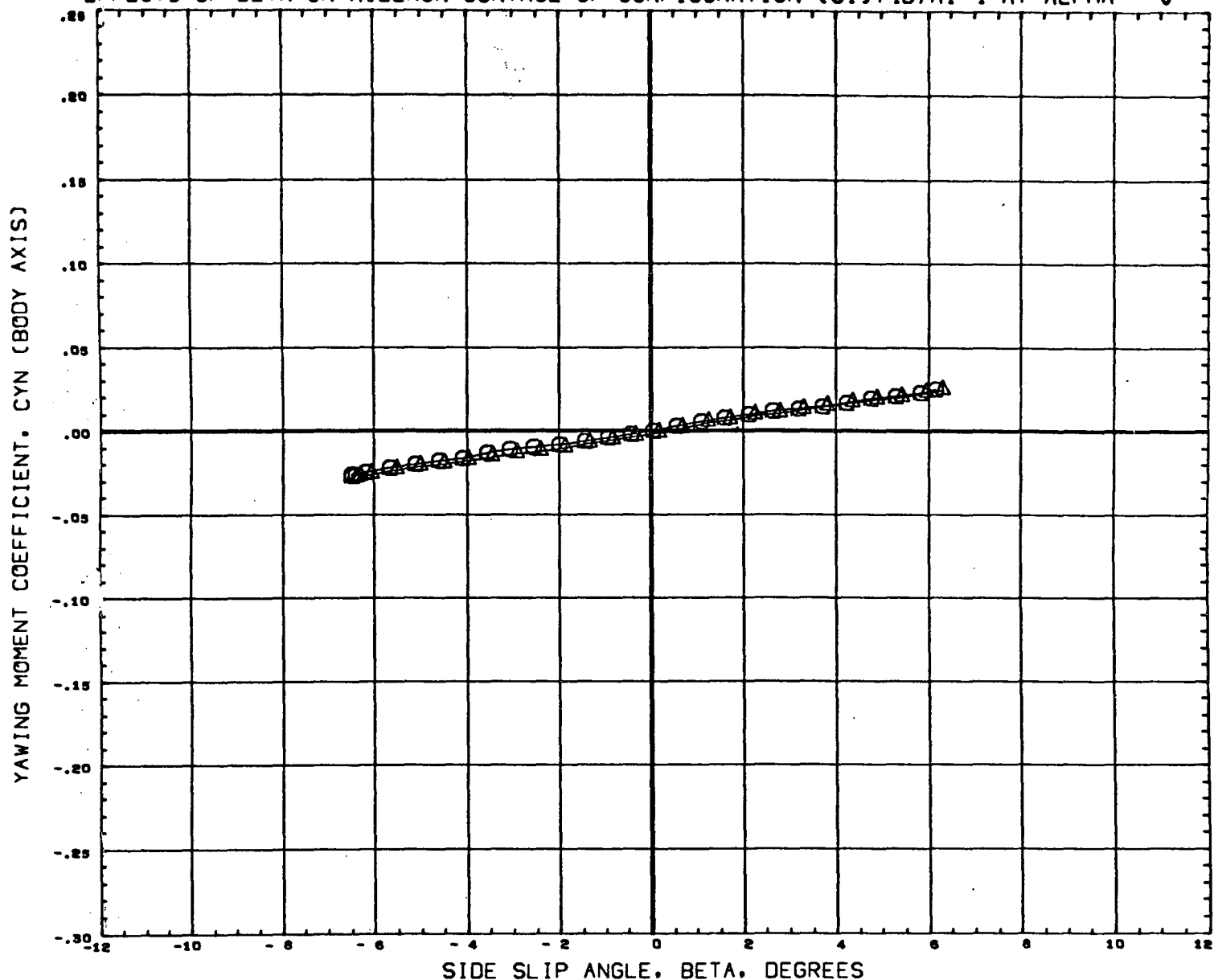


| DATA SET | SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|----------|--------|--|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | ○ | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D2) | △ | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | | BREF | 882.0004 IN. |
| | | | | | | | XMRP | 557.0004 IN. |
| | | | | | | | YMRP | 0.0000 IN. |
| | | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

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EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (T074C8) | MDAC S-222 COMPOSITE(T-C6) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D2) | MDAC S-222 COMPOSITE(T-C6) (01)T4B7A1-4 | 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 537.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

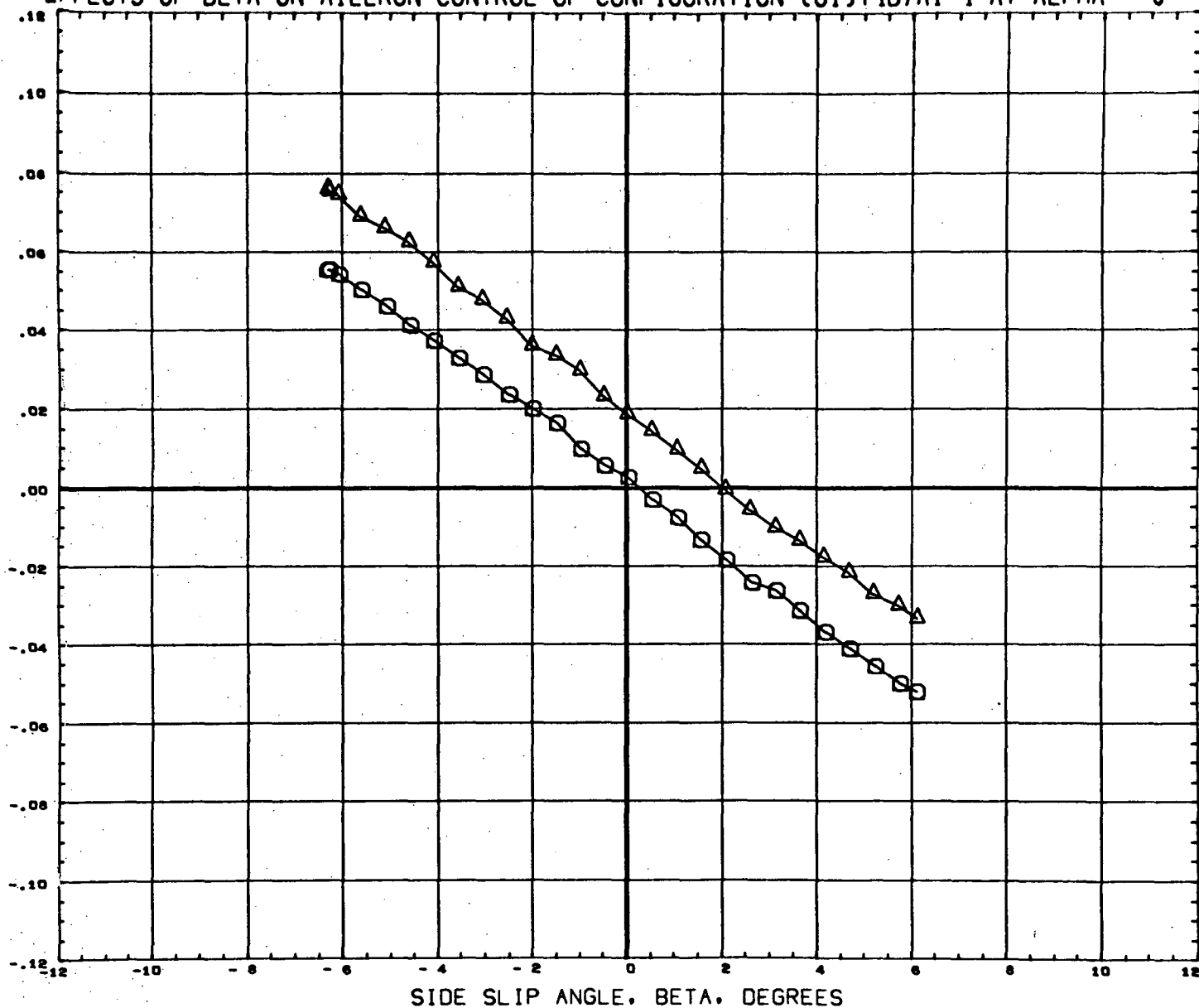
MACH

4.47

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EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (TD74C8) (O) MDAC S-222 COMPOSITE(T-C6) (01)T4B7A1-4
 (RD74D2) (Δ) MDAC S-222 COMPOSITE(T-C6) (01)T4B7A1-4

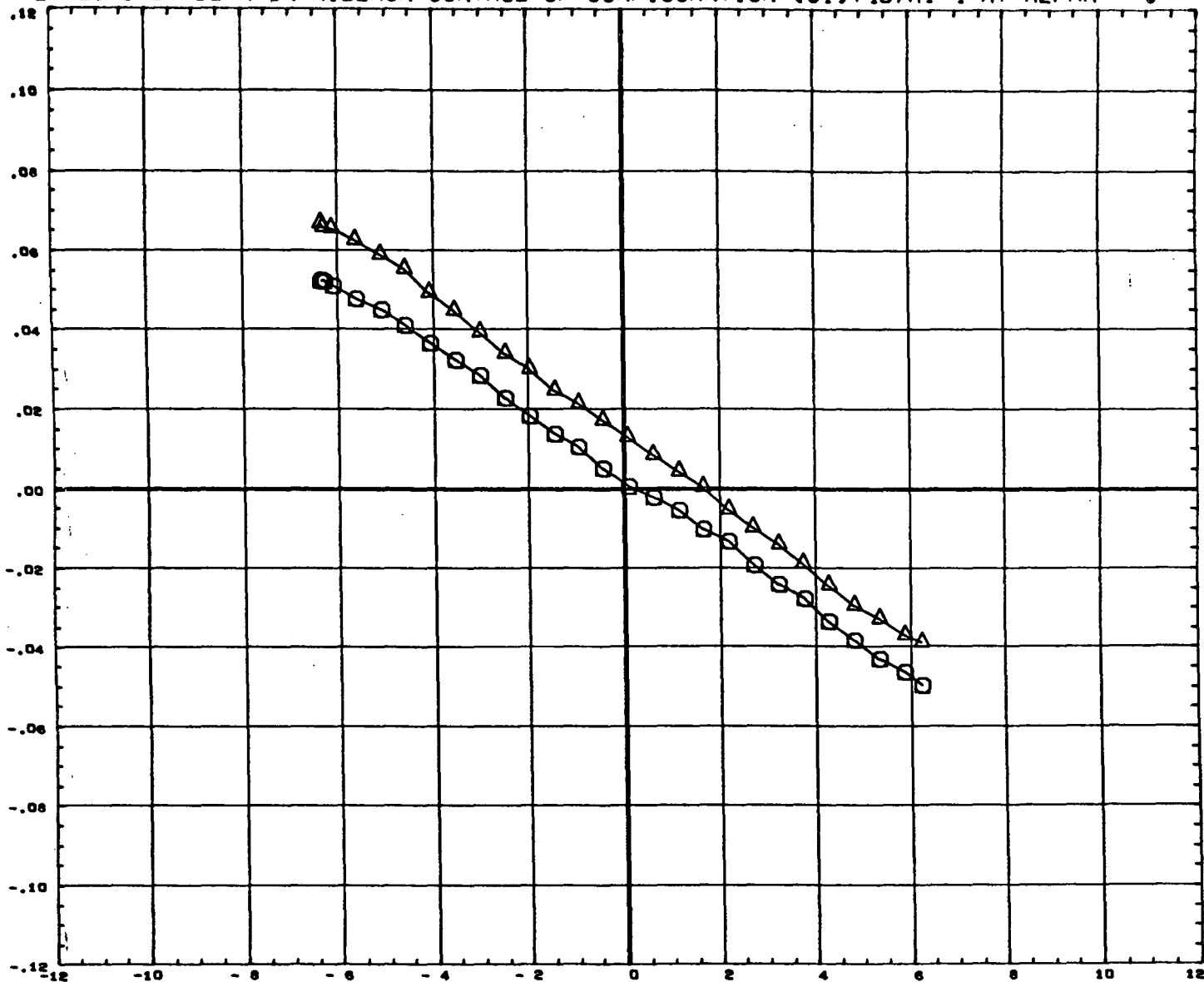
| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.3004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 357.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH .58

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EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



SIDE SLIP ANGLE, BETA, DEGREES

DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (TD74C8) ○ MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (RD74D2) Δ MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

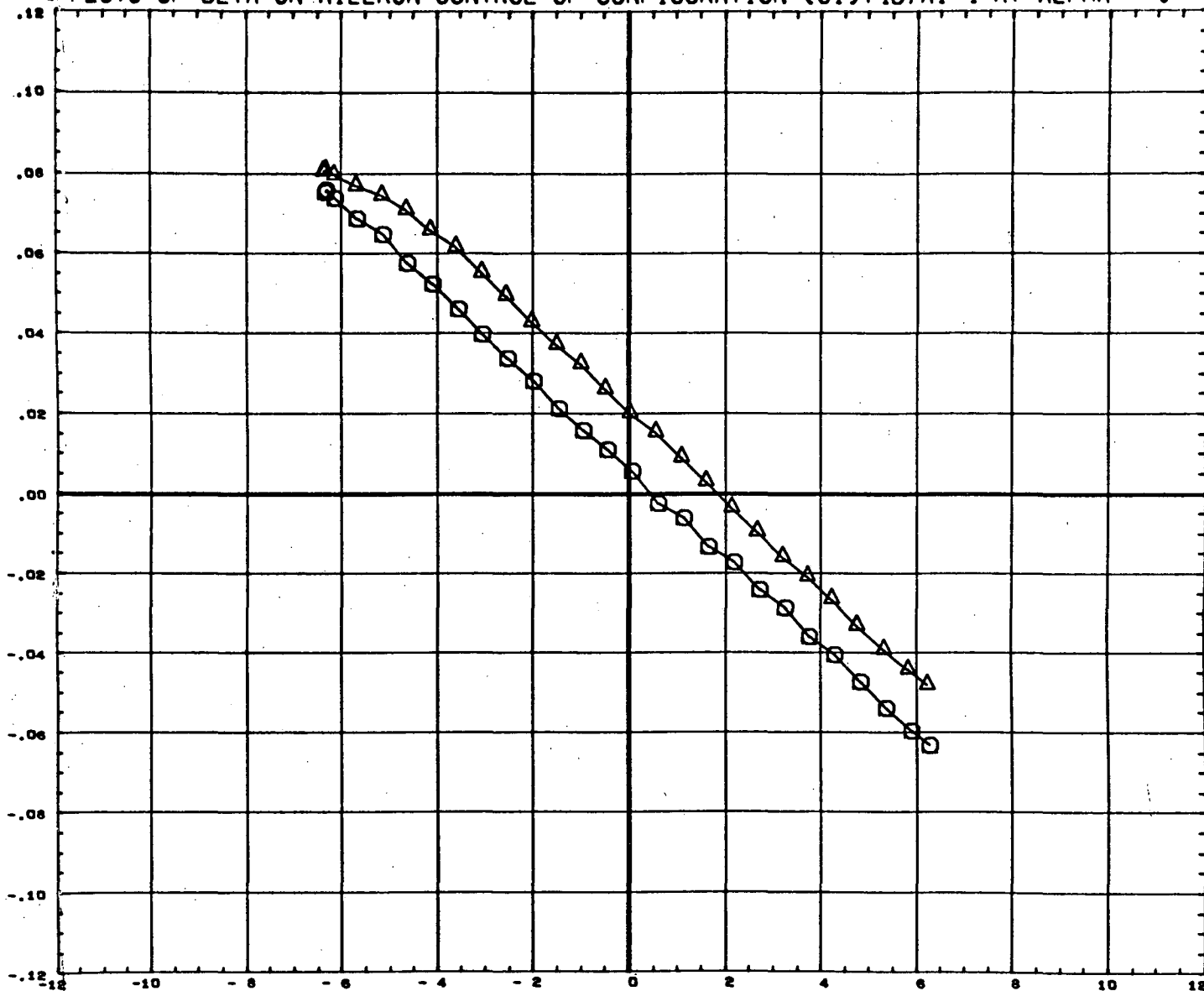
| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-------|--------|--------|--------|-----------------------|-----------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | BREF | 682.0004 | IN. |
| | | | | XMRP | 957.0004 | IN. |
| | | | | YMRP | 0.0000 | IN. |
| | | | | ZMRP | 200.0004 | IN. |
| | | | | SCALE | 0.0060 | SCALE |

MACH .90

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EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C8) ○ MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
(RD74D2) Δ MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

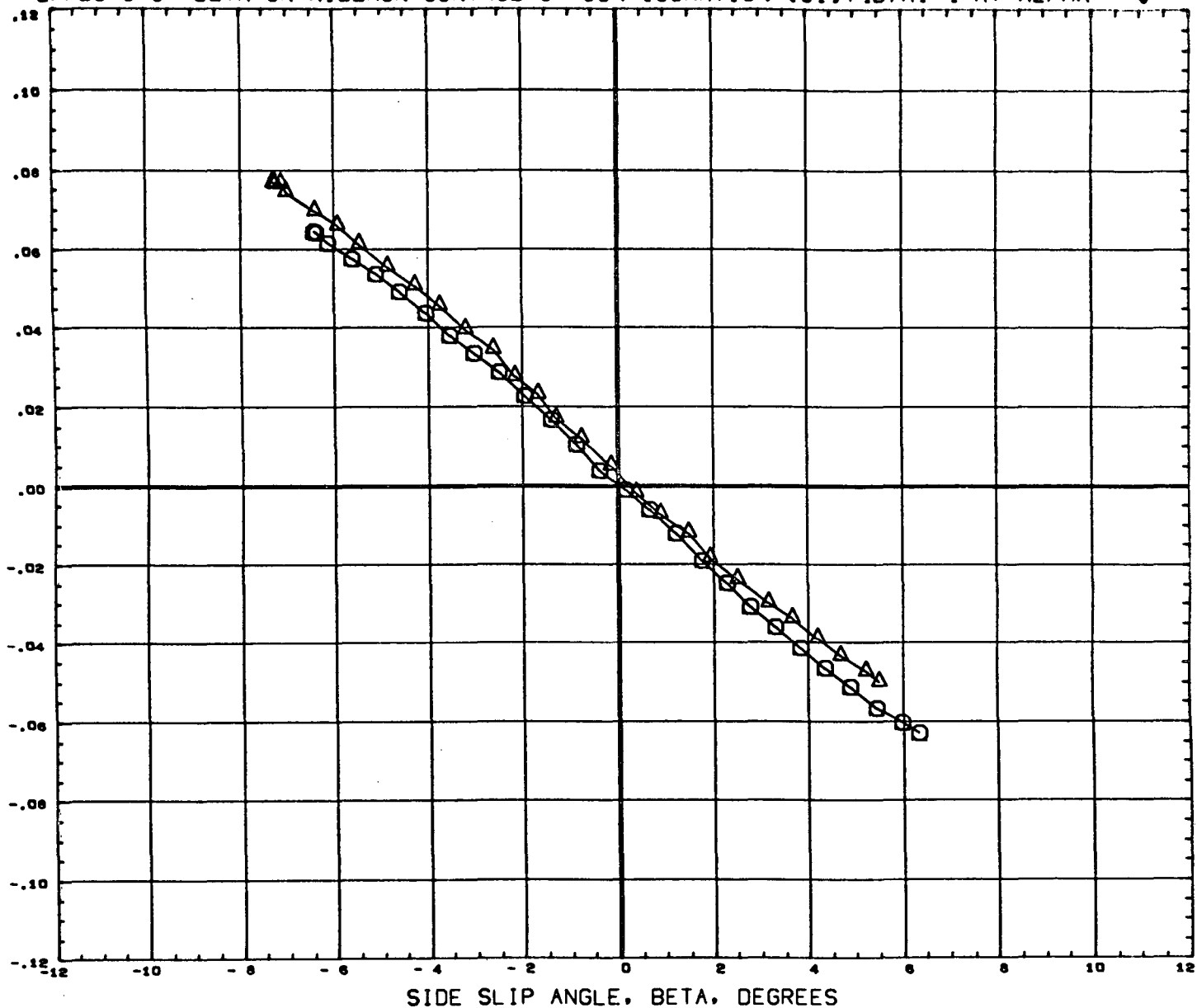
| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-------|--------|--------|--------|-----------------------|-----------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | BREF | 882.0004 | IN. |
| | | | | XMRF | 557.0004 | IN. |
| | | | | YMRF | 0.0000 | IN. |
| | | | | ZMRF | 200.0004 | IN. |
| | | | | SCALE | 0.0060 | SCALE |

MACH 1.08

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EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



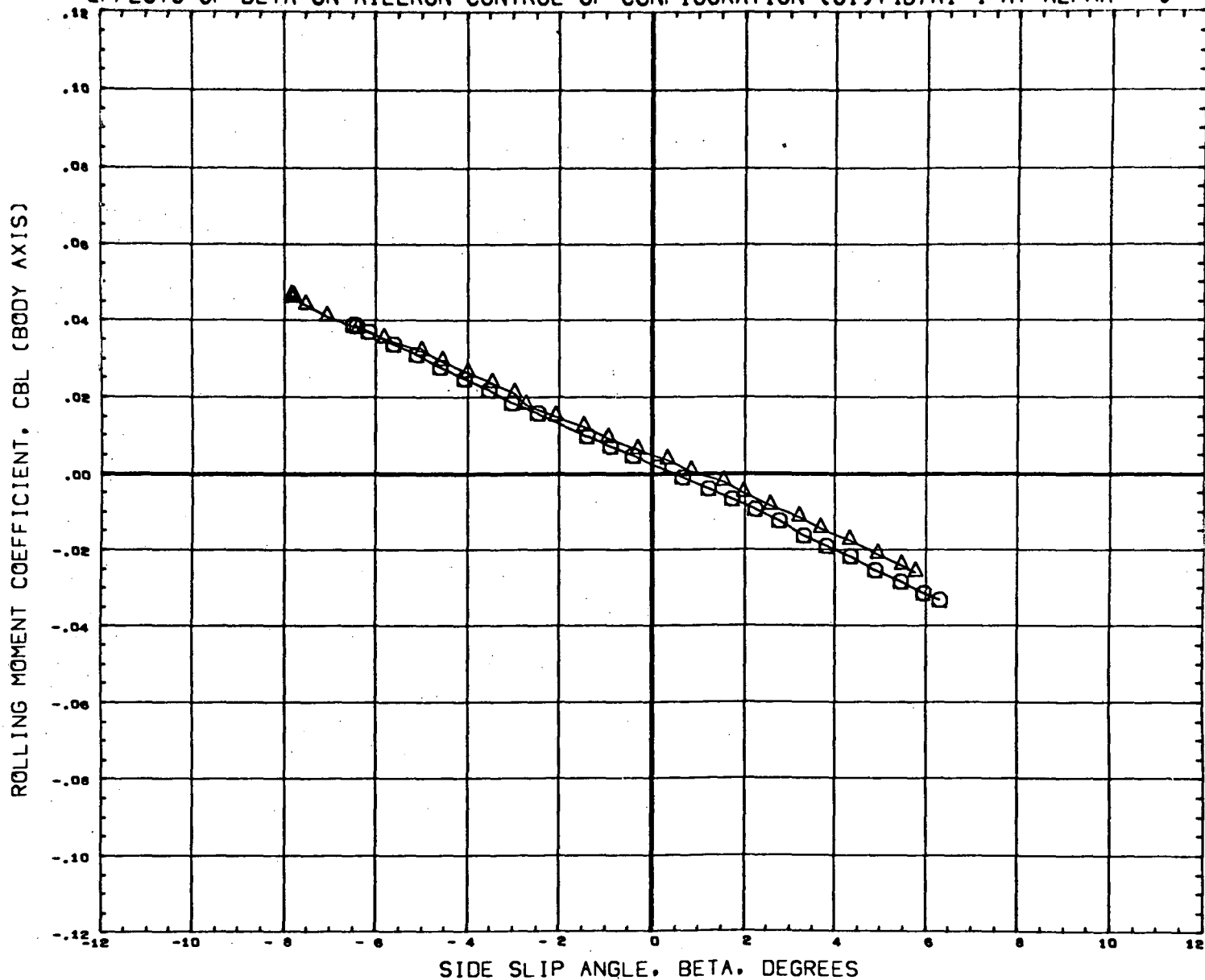
DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (TD74C8) \square MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (RD74D2) \triangle MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 1.51

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EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C6) (RD74D2) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRF | 557.0004 IN. |
| | | | | YMRF | 0.0000 IN. |
| | | | | ZMRF | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

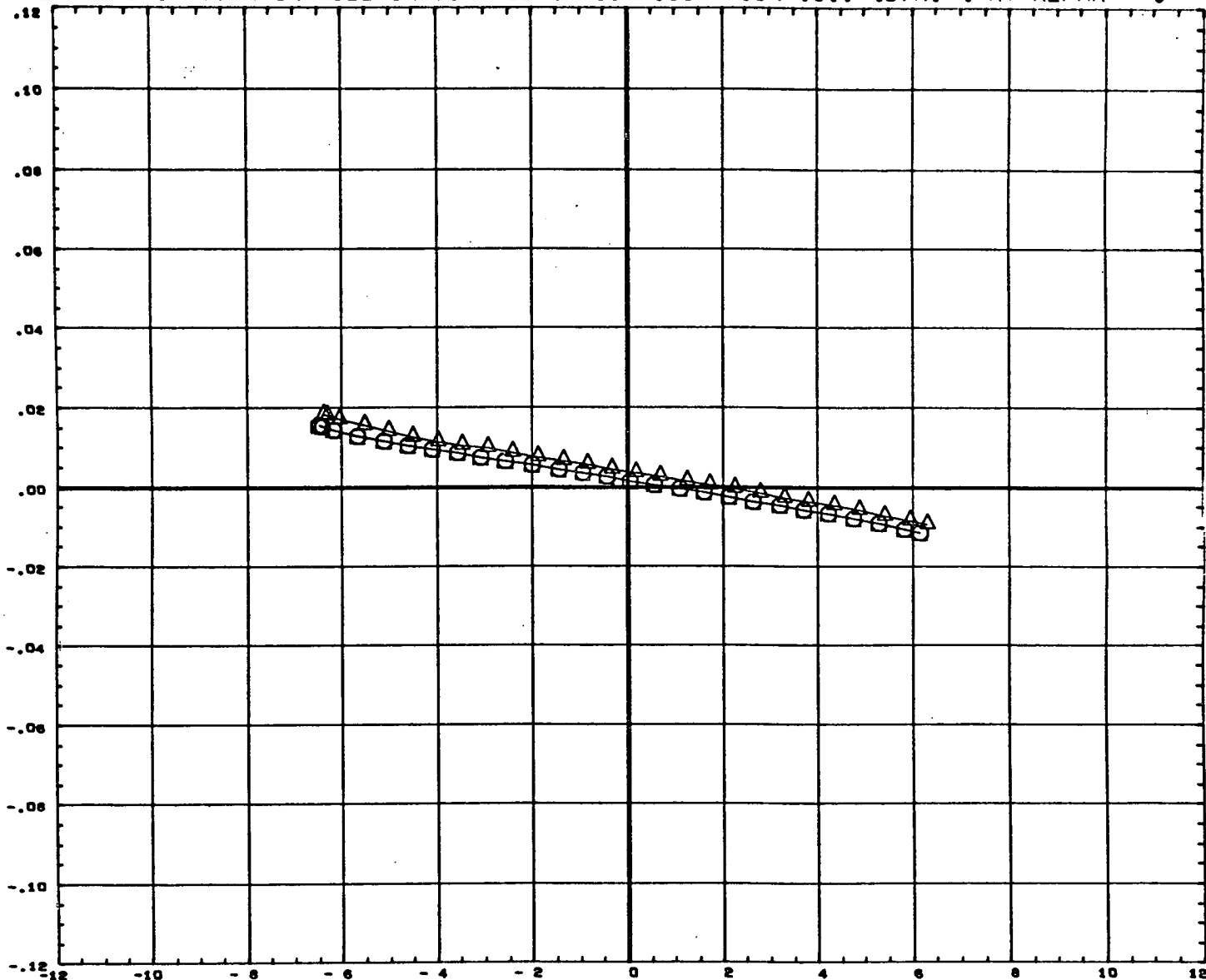
MACH

2.20

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EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



SIDE SLIP ANGLE, BETA, DEGREES

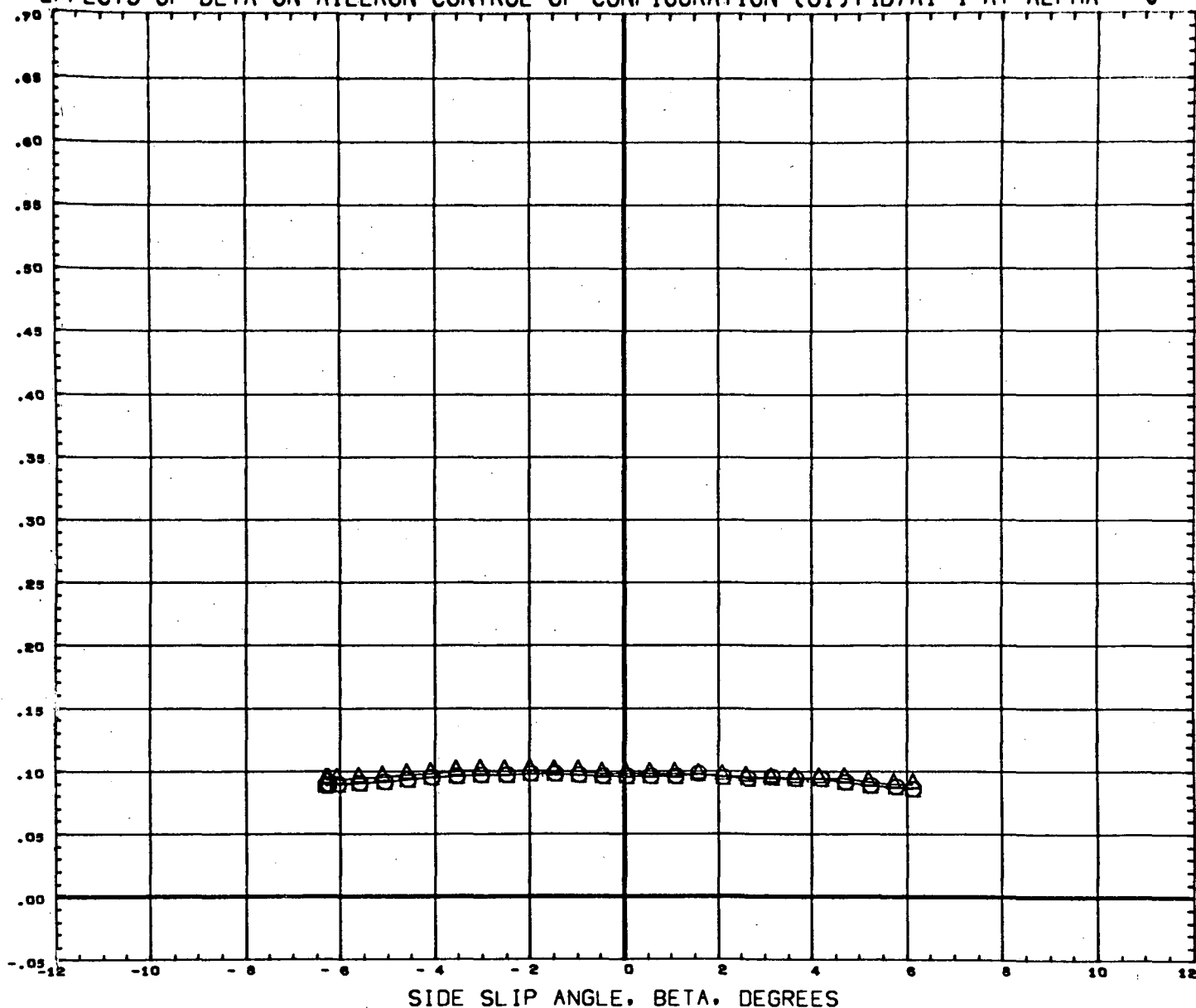
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D2) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47



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EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C6)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
 (RD74D2)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 20.000 | 0.000 |

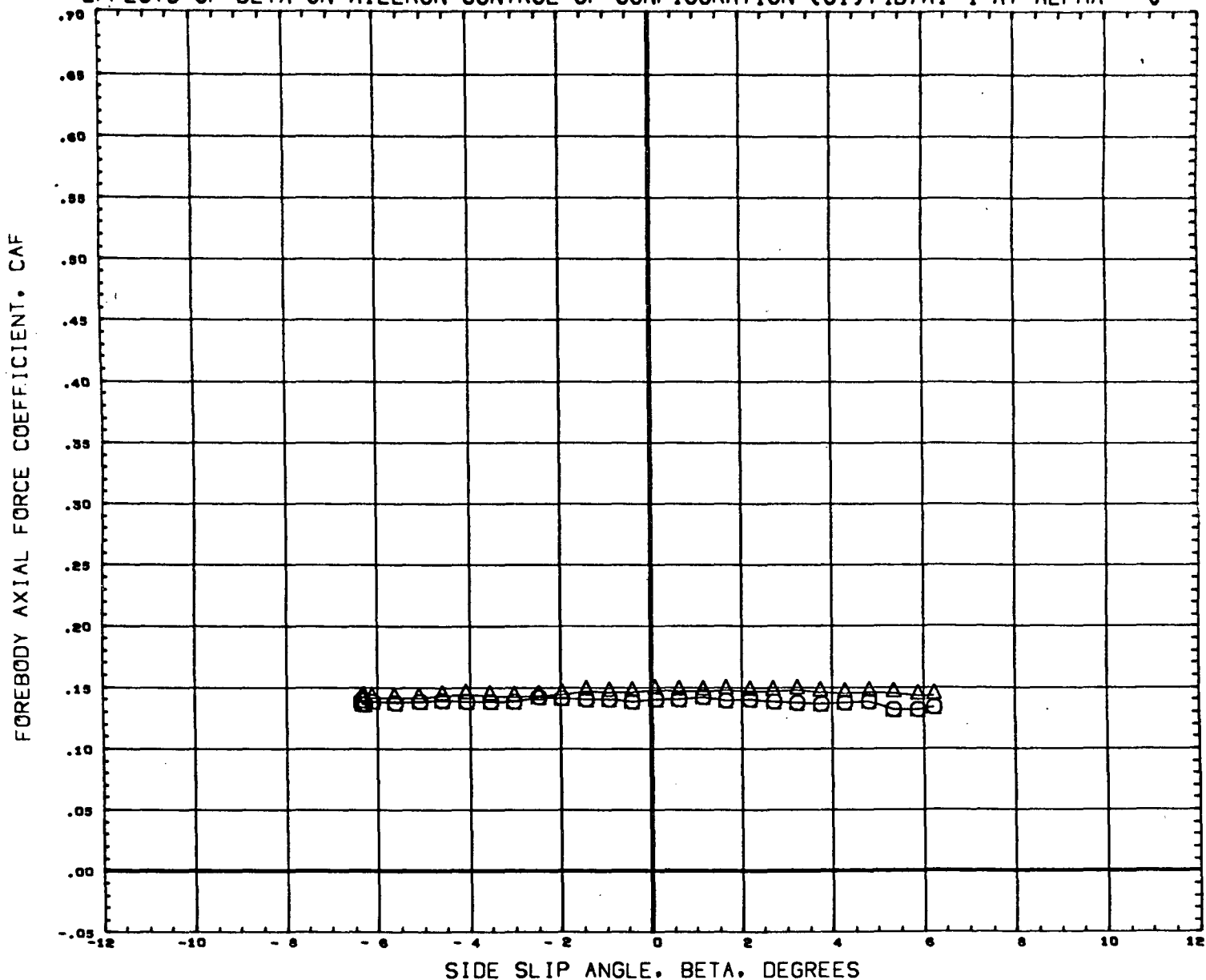
REFERENCE INFORMATION

| | | |
|-------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH .58

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EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C8) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
(RD74D2) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

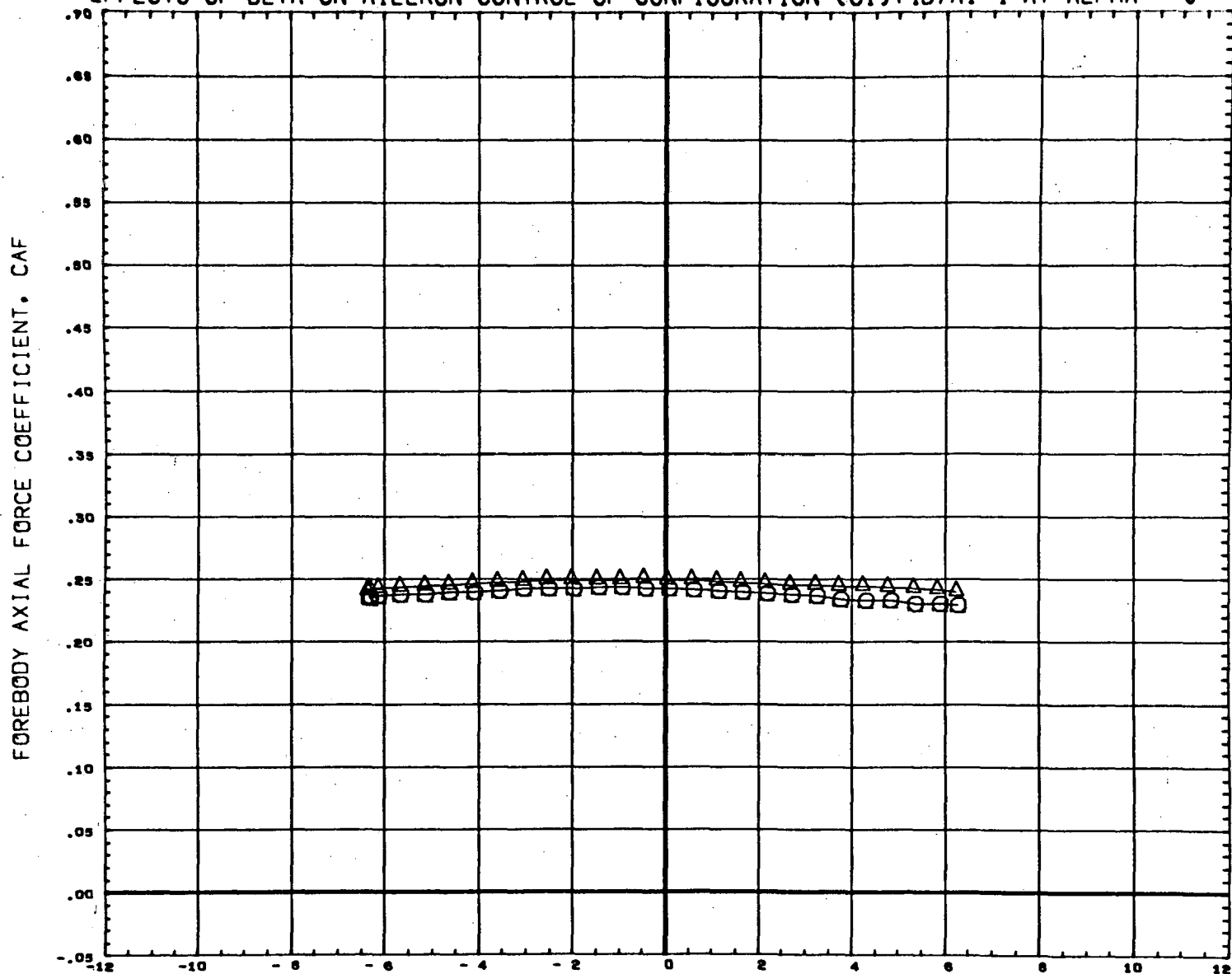
| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 20.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH .90

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EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0



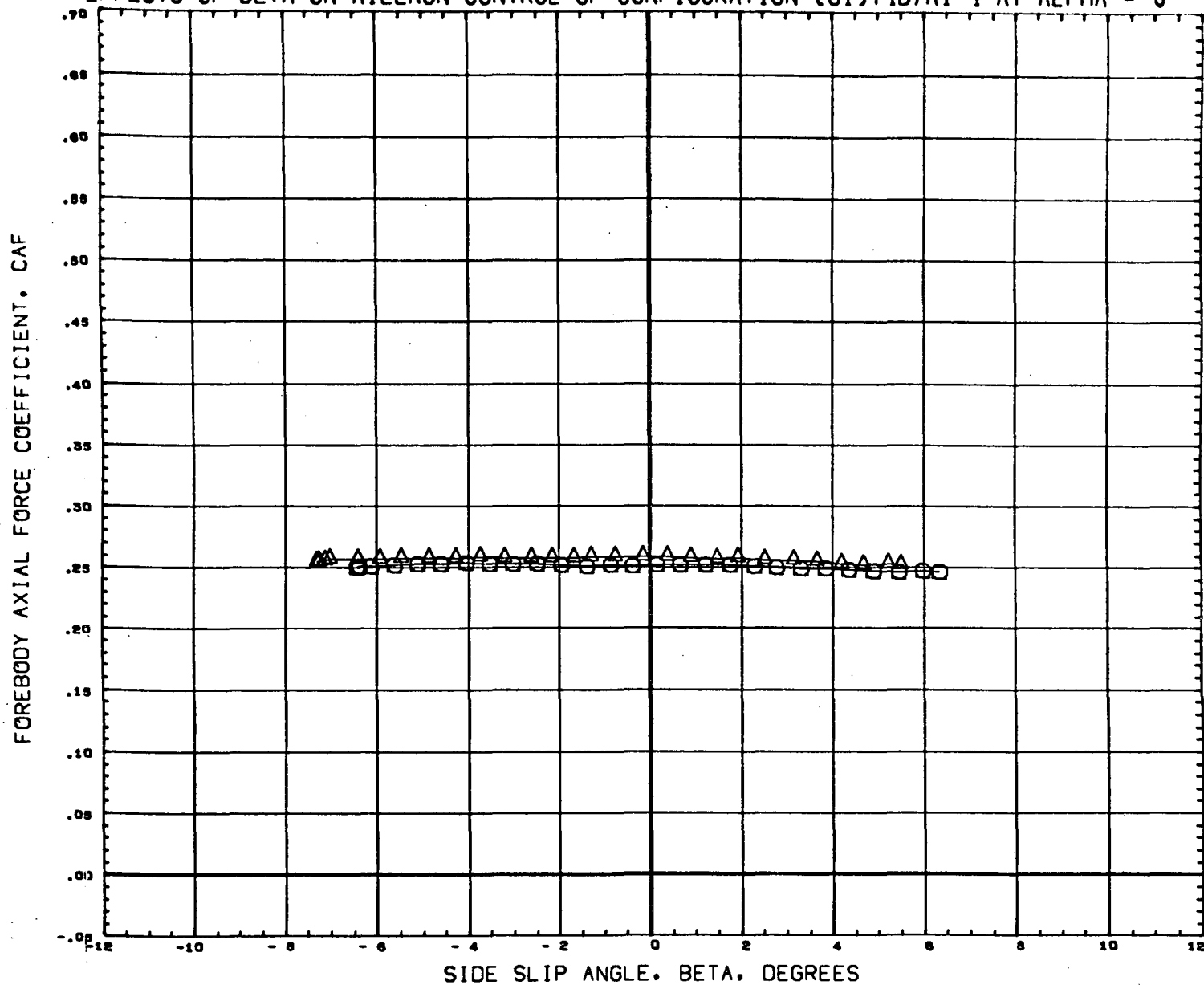
SIDE SLIP ANGLE, BETA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D2) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

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EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (TD74C6) Q MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (RD74D2) A MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

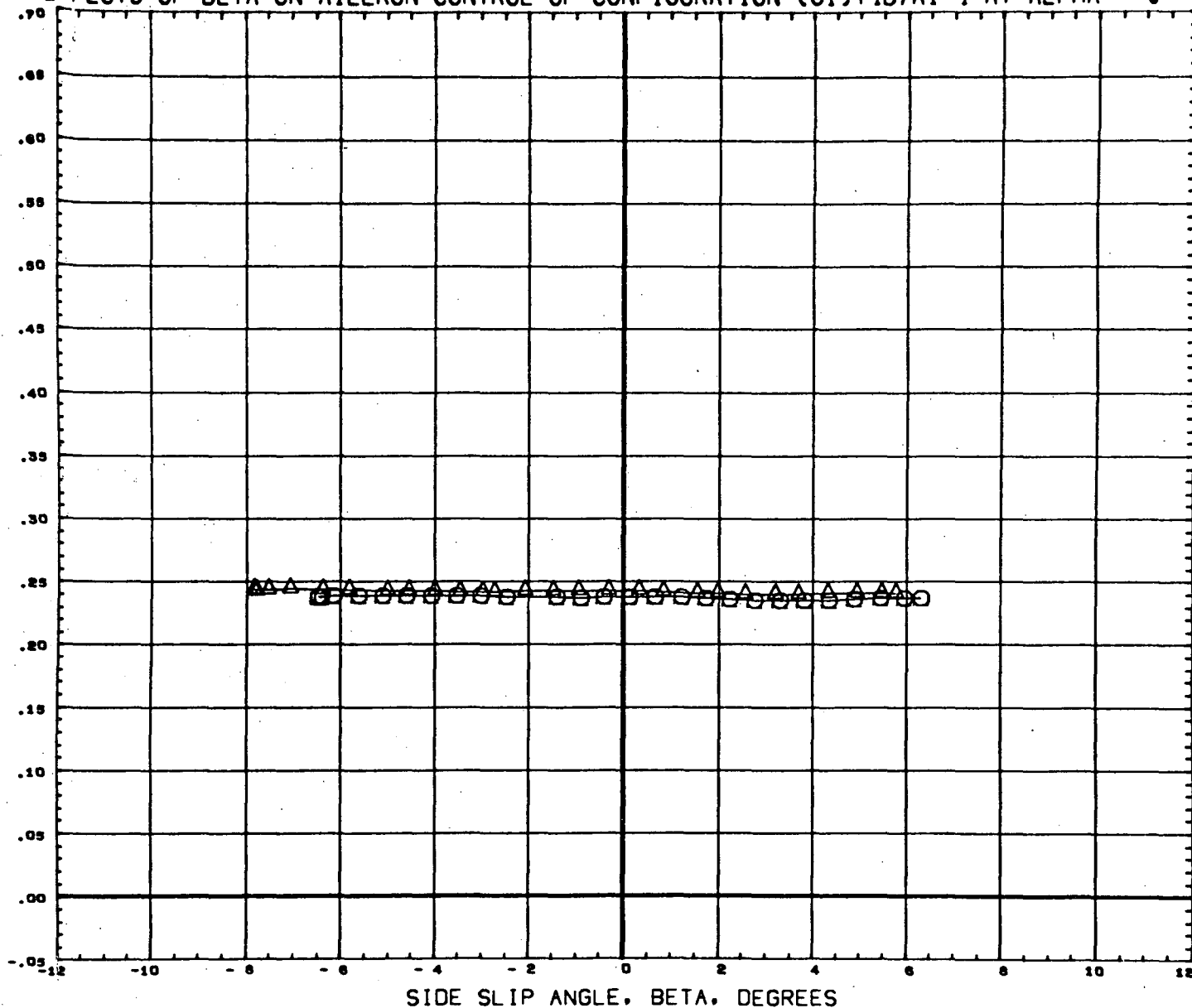
| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-------|--------|--------|--------|-----------------------|-----------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| 0.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | BREF | 882.0004 | IN. |
| | | | | XMRP | 557.0004 | IN. |
| | | | | YMRP | 0.0000 | IN. |
| | | | | ZMRP | 200.0004 | IN. |
| | | | | SCALE | 0.0060 | SCALE |

MACH 1.51

PAGE 150

EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (O1)T4B7A1-4 AT ALPHA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (TD74C8) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 |
| (RD74D2) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 |

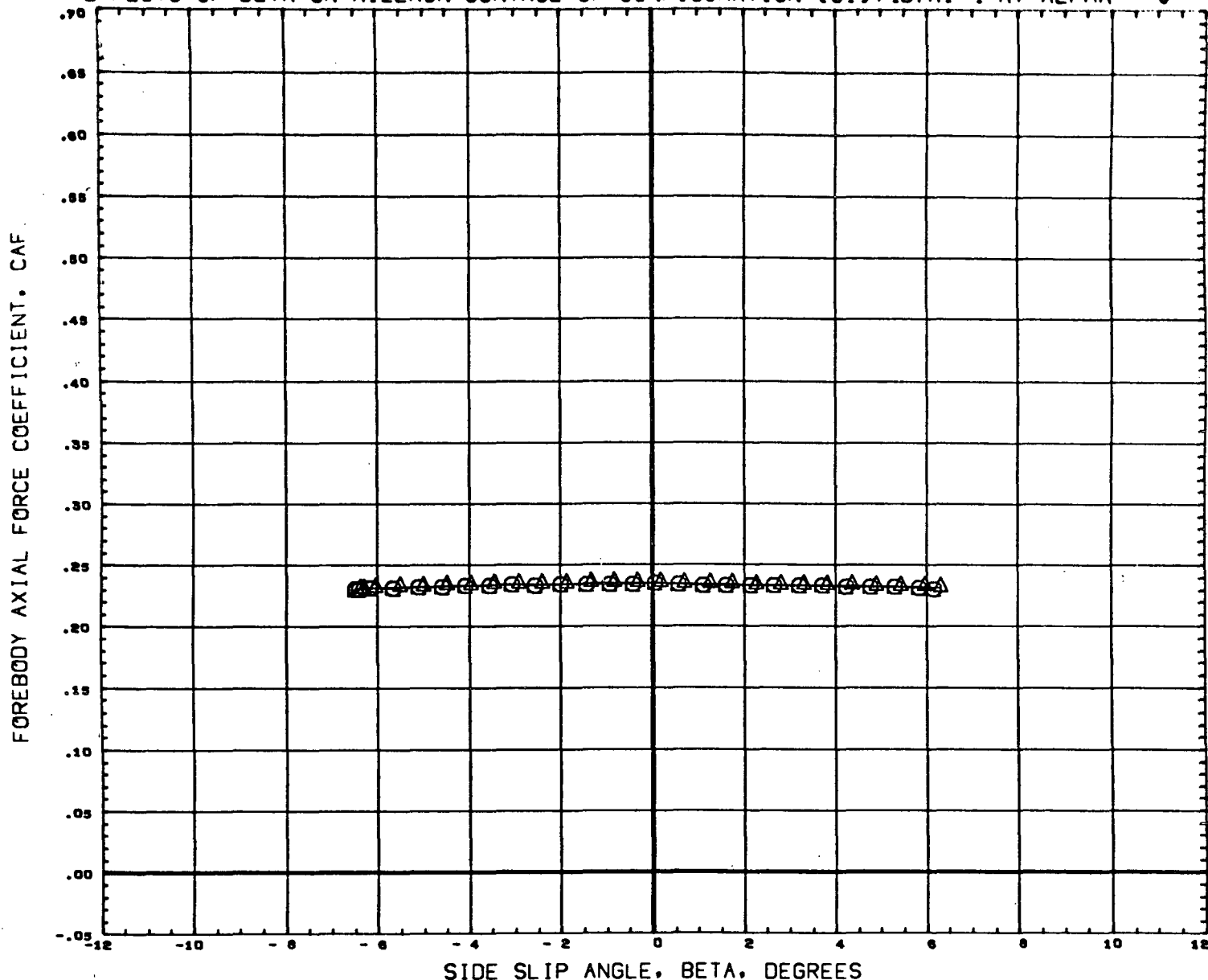
| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 20.000 | 0.000 |

| REFERENCE INFORMATION | |
|-----------------------|-------------------|
| SREF | 3155.3040 SQ. FT. |
| LREF | 609.5004 IN. |
| BREF | 882.0004 IN. |
| XM RP | 557.0004 IN. |
| YM RP | 0.0000 IN. |
| ZM RP | 200.0004 IN. |
| SCALE | 0.0060 SCALE |

MACH 2.20

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EFFECTS OF BETA ON AILERON CONTROL OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C8) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (RD74D2) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 20.000 | 0.000 |

REFERENCE INFORMATION

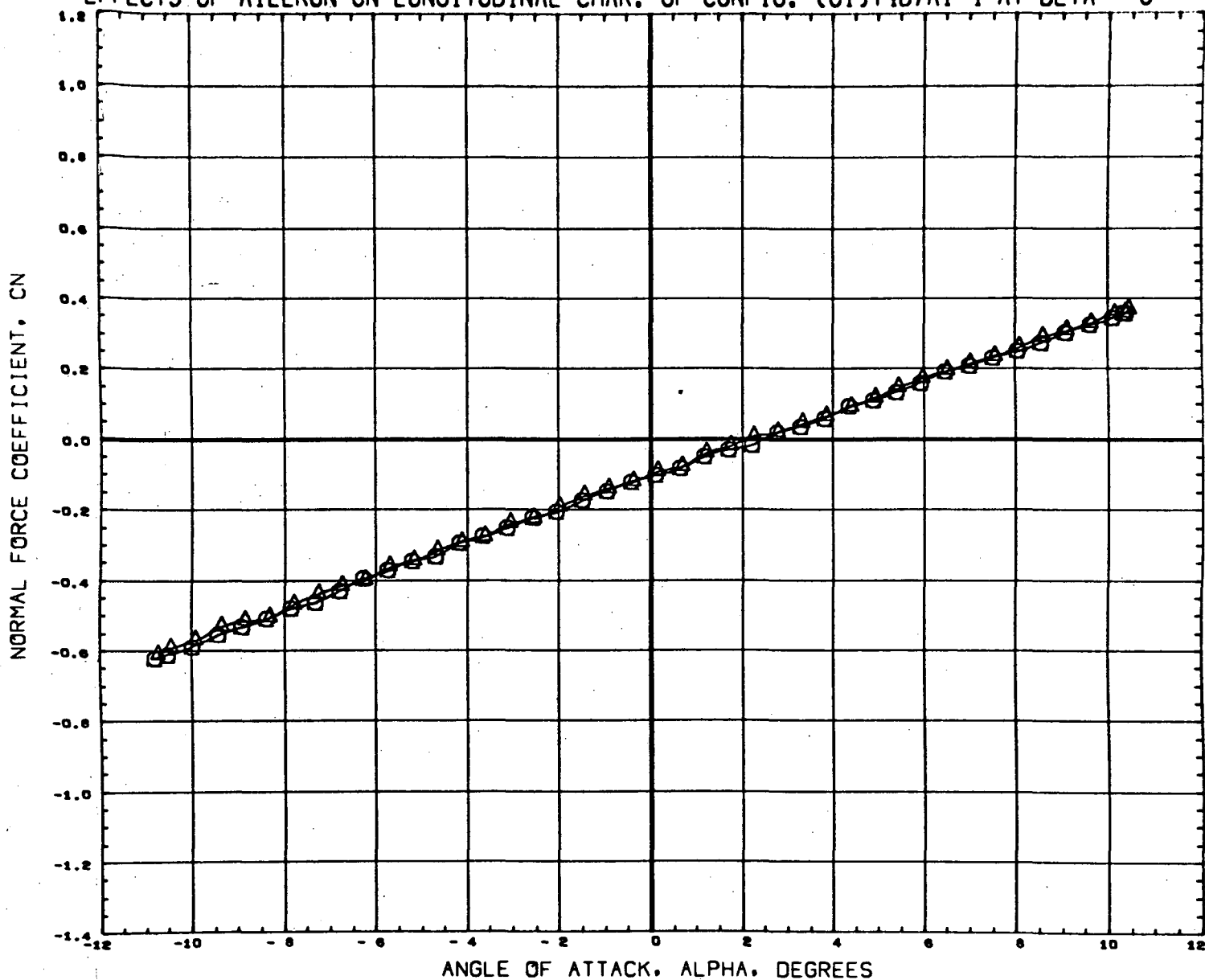
| | | |
|-------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| YNRP | 557.0004 | IN. |
| YNRP | 0.0000 | IN. |
| ZNRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH



4.47

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C9)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
 (CD74D3)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

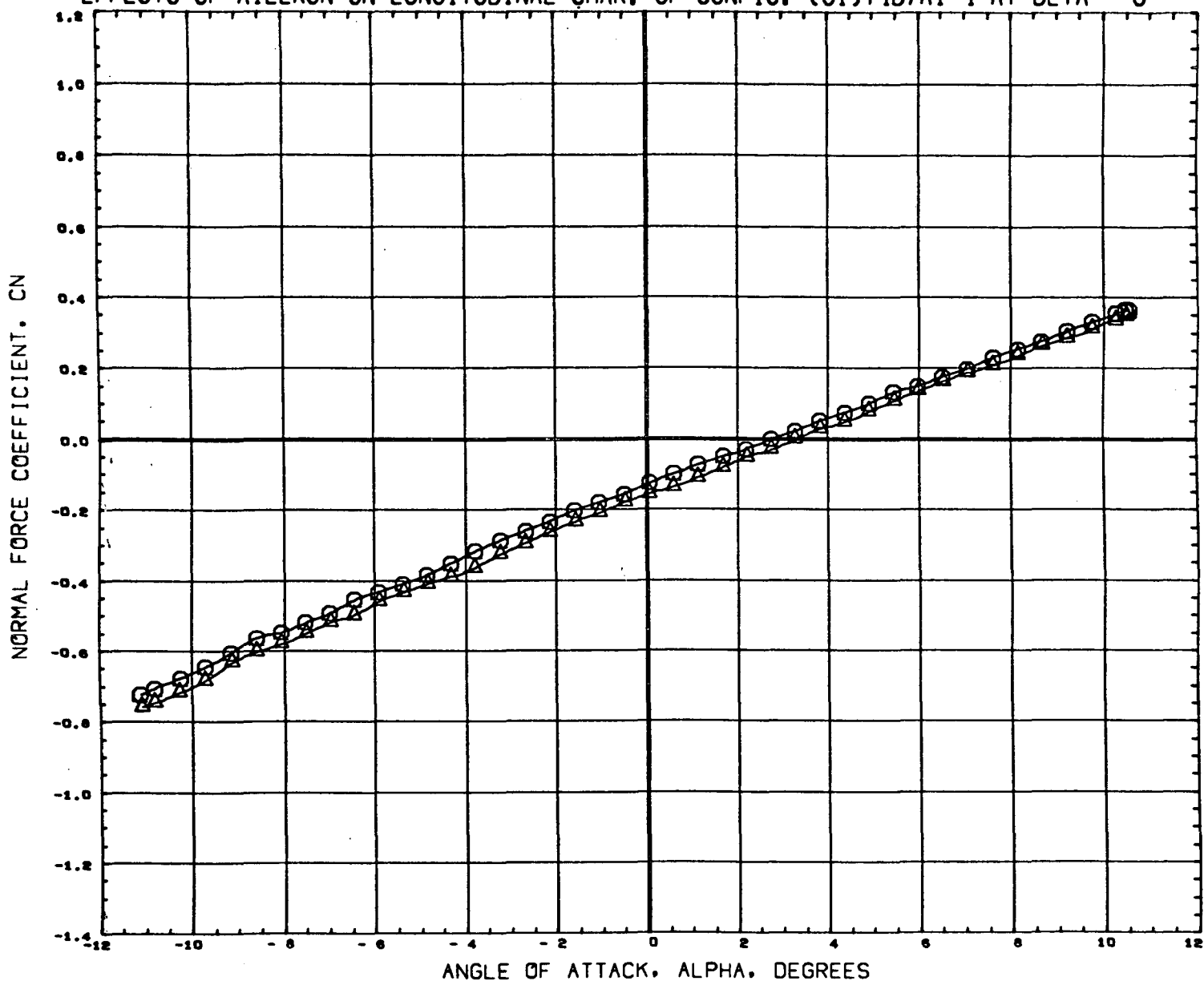
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 6.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 20.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|---------|
| SREF | 3155.3040 | SQ. FT. |
| LREF | 609.5004 | IN. |
| SREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH .58

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C9) (01)T4B7A1-4
(CD74D3) (01)T4B7A1-4

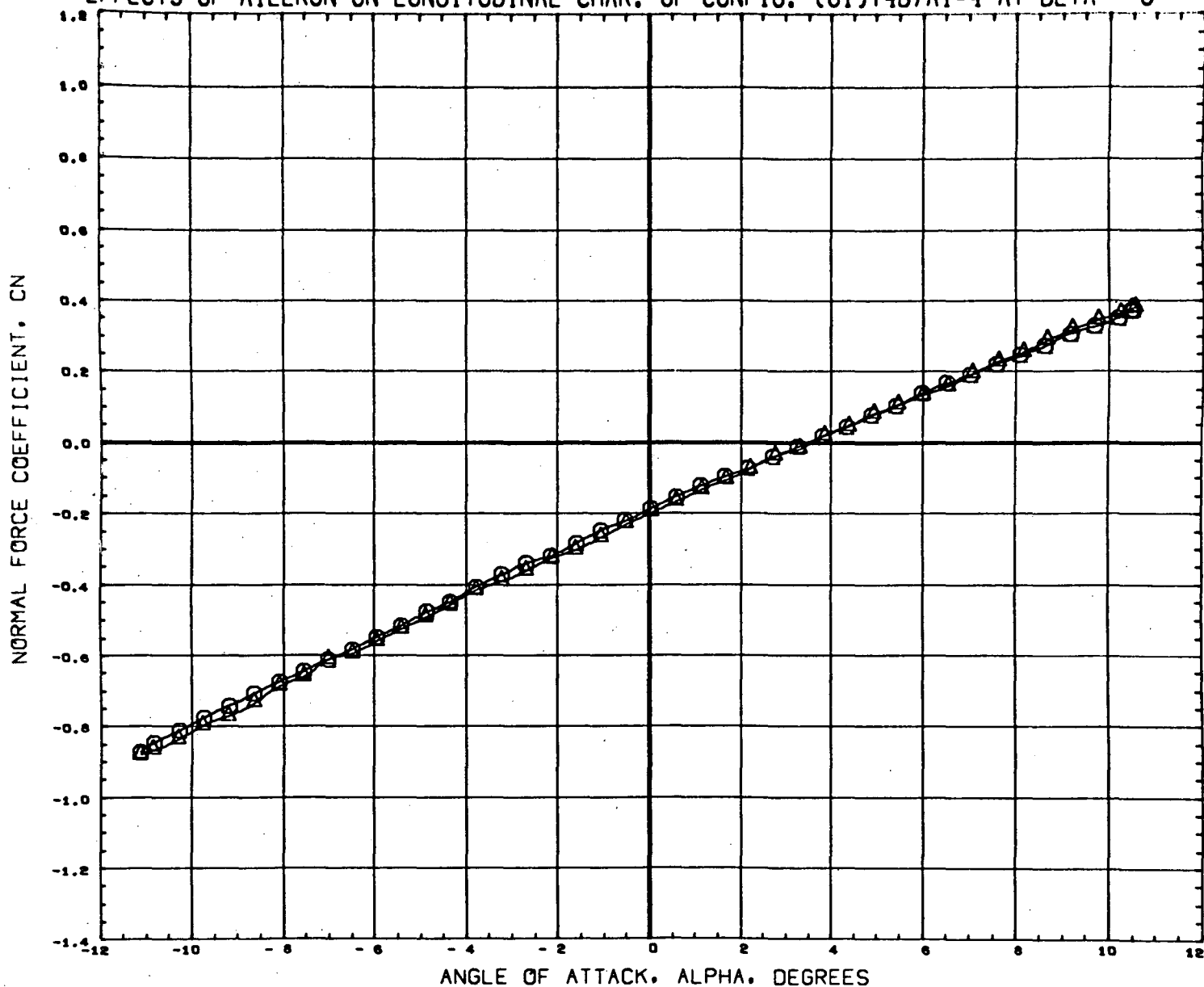
BETA 6.000
ELEVTR 0.000
AILRON 0.000
RUDDER 0.000

REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.3004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0080 SCALE

MACH .90

PAGE 154

EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

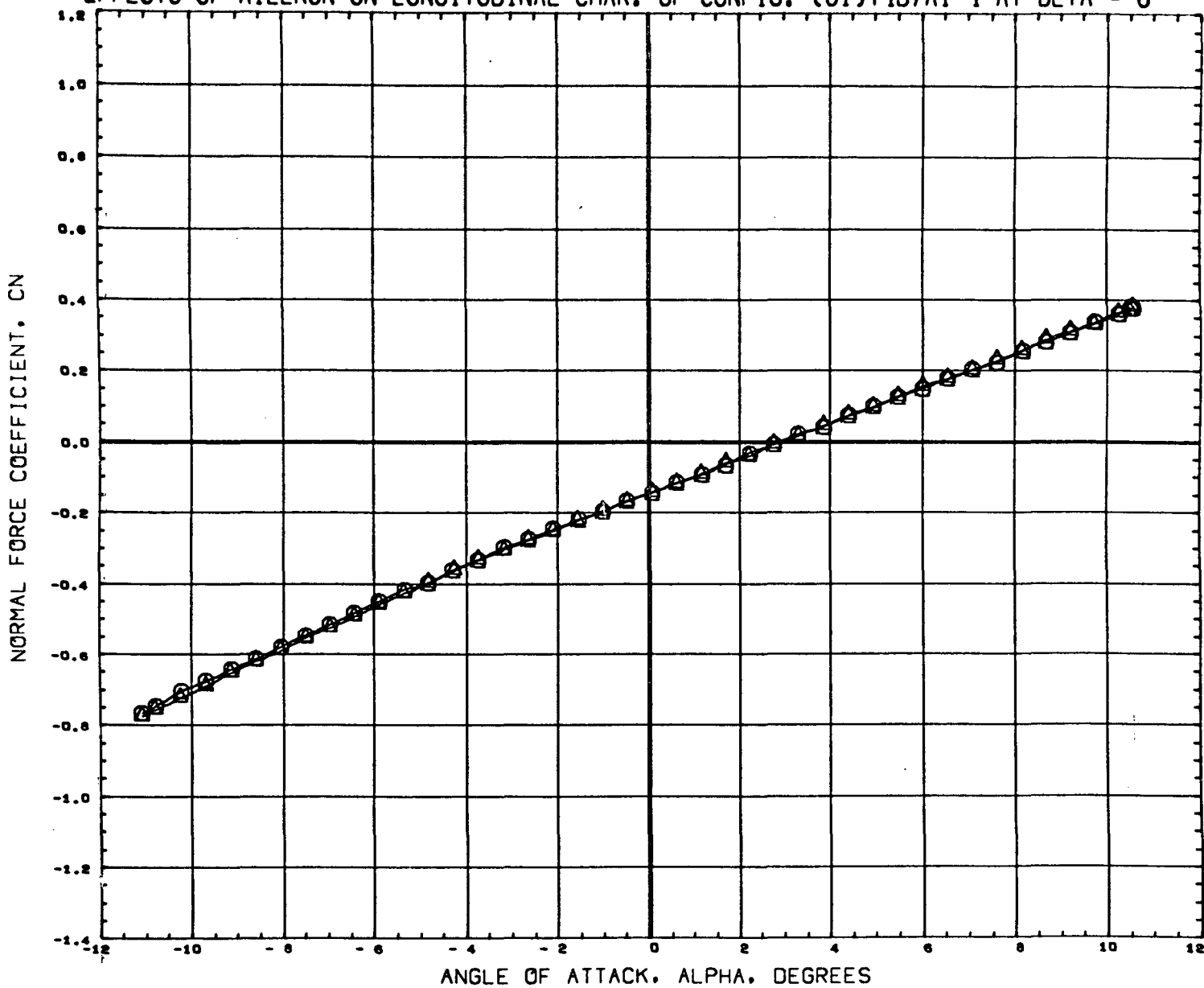


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMHP | 557.0004 IN. |
| | | | | | | YMHP | 0.0000 IN. |
| | | | | | | ZMHP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.10

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

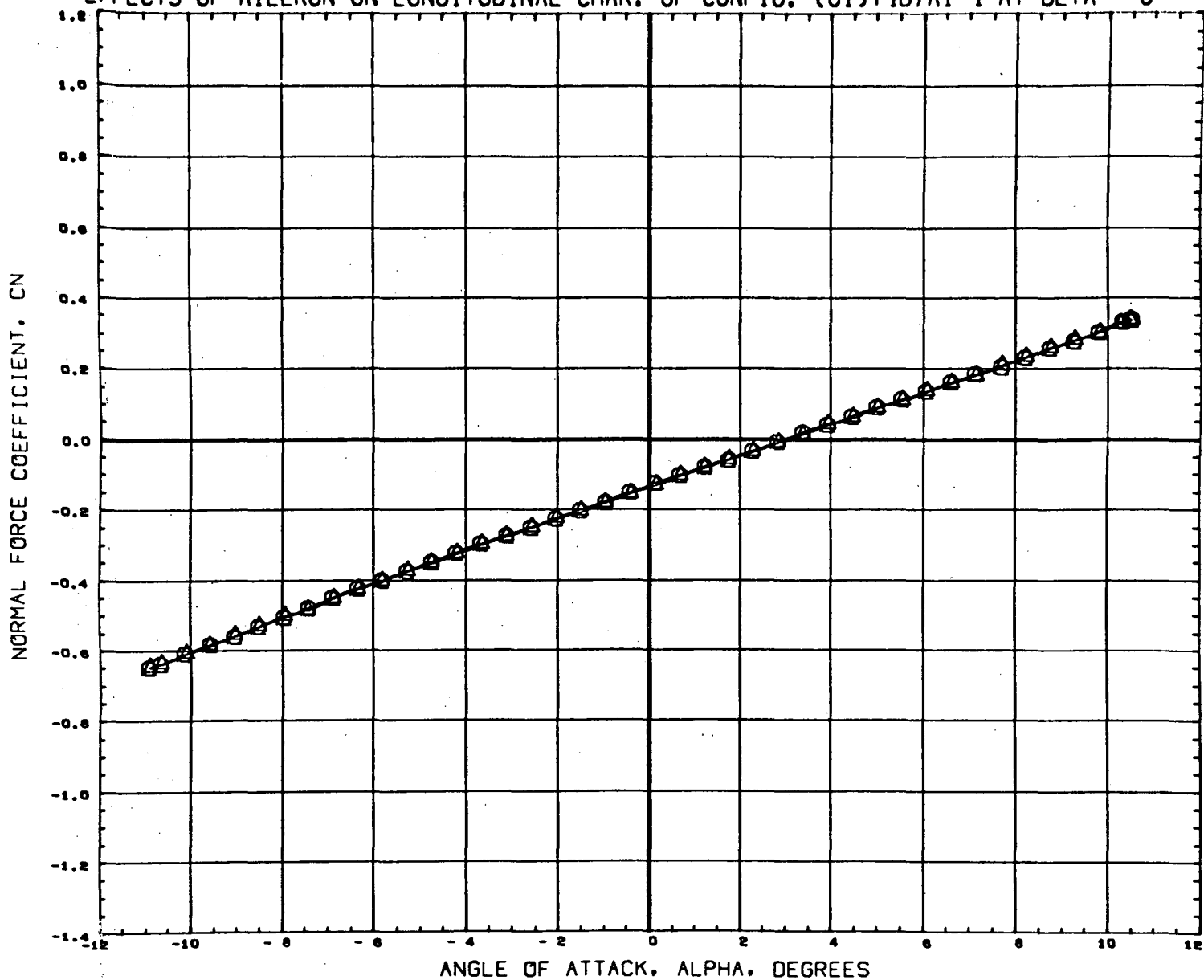


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.3004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 537.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.51

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



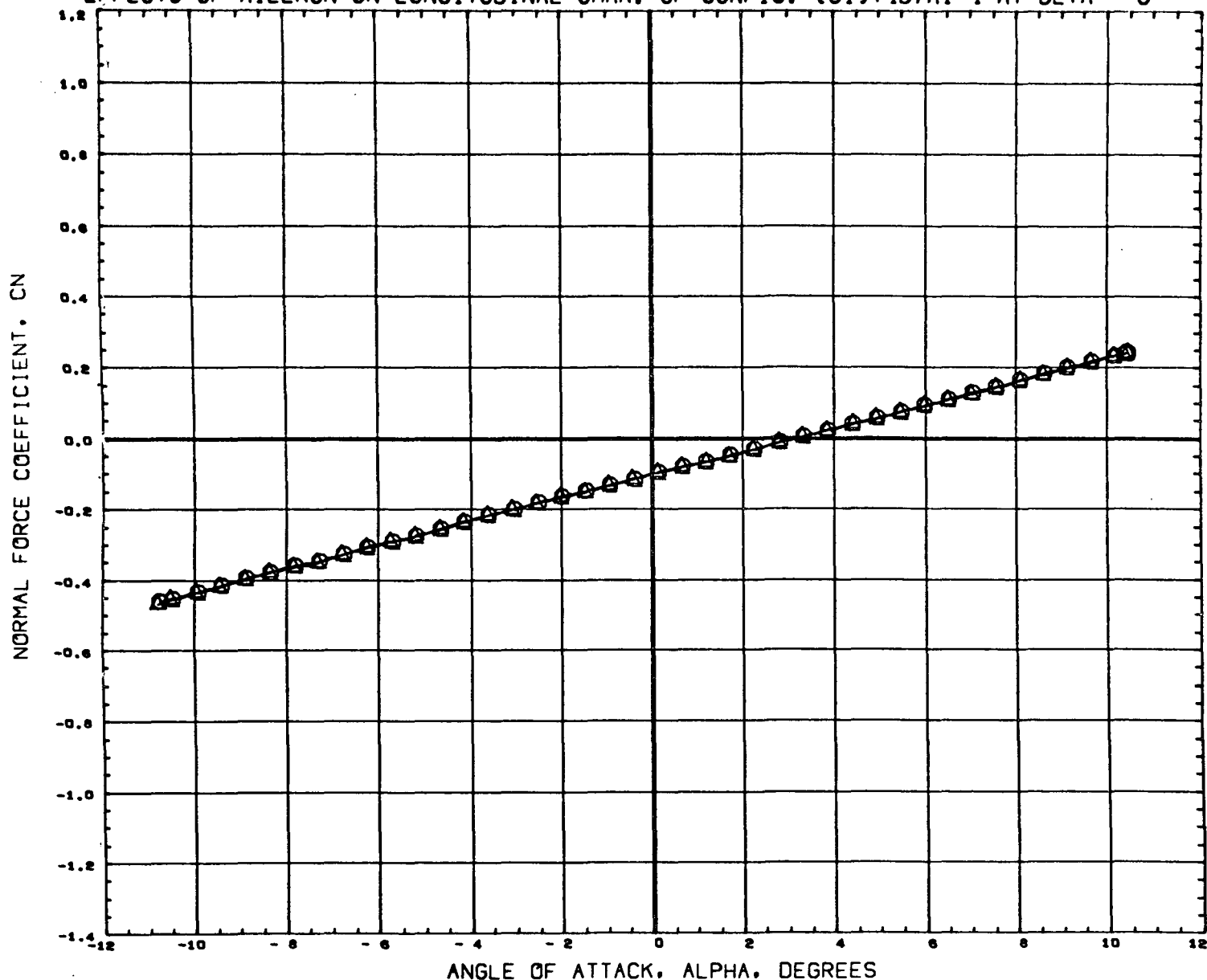
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (CD74D3) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 6.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 20.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH 2.20

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



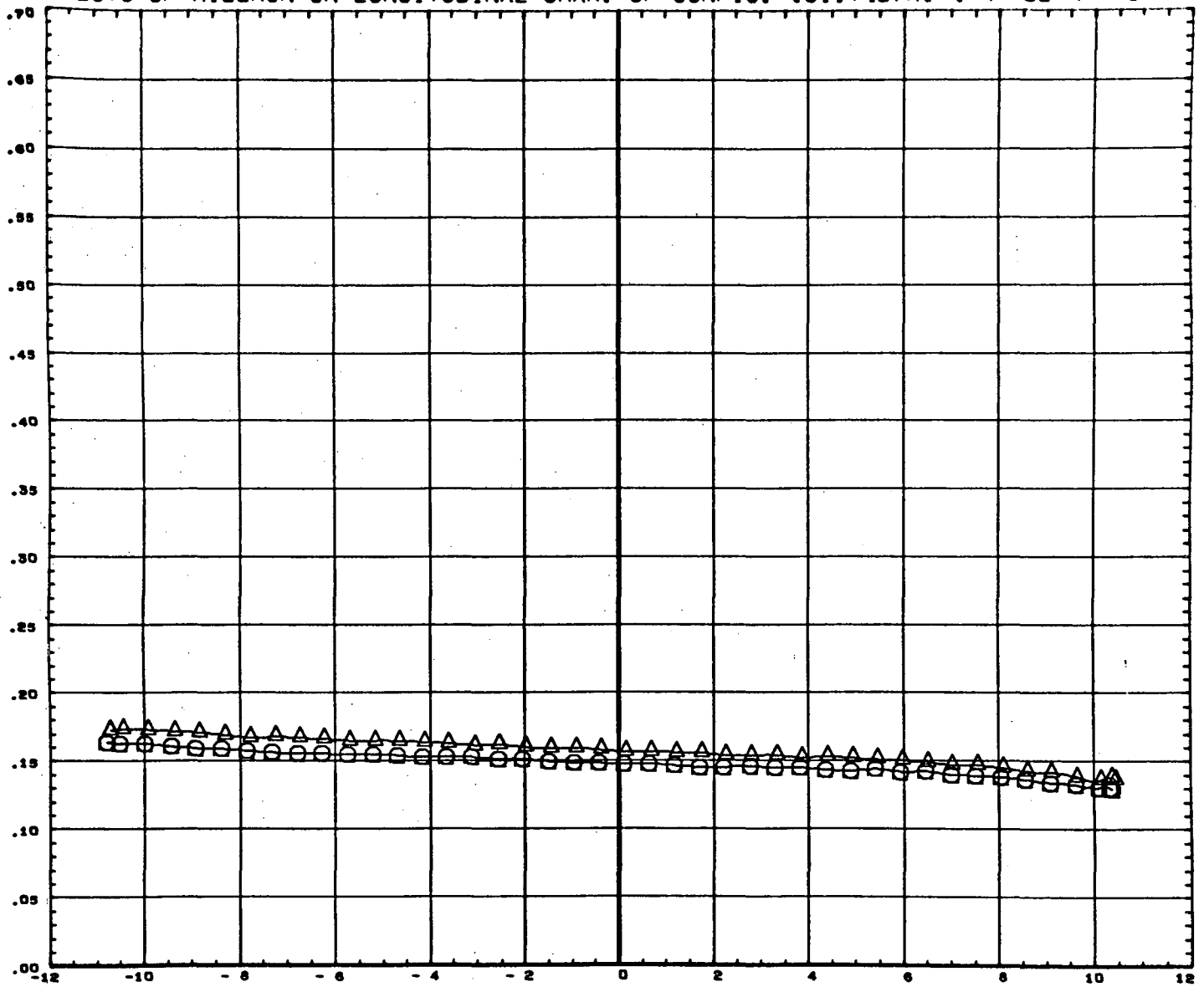
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D3) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XM RP | 557.0004 IN. |
| | | | | | | YM RP | 0.0000 IN. |
| | | | | | | ZM RP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

AXIAL FORCE COEFFICIENT, CA



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (CD74D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |

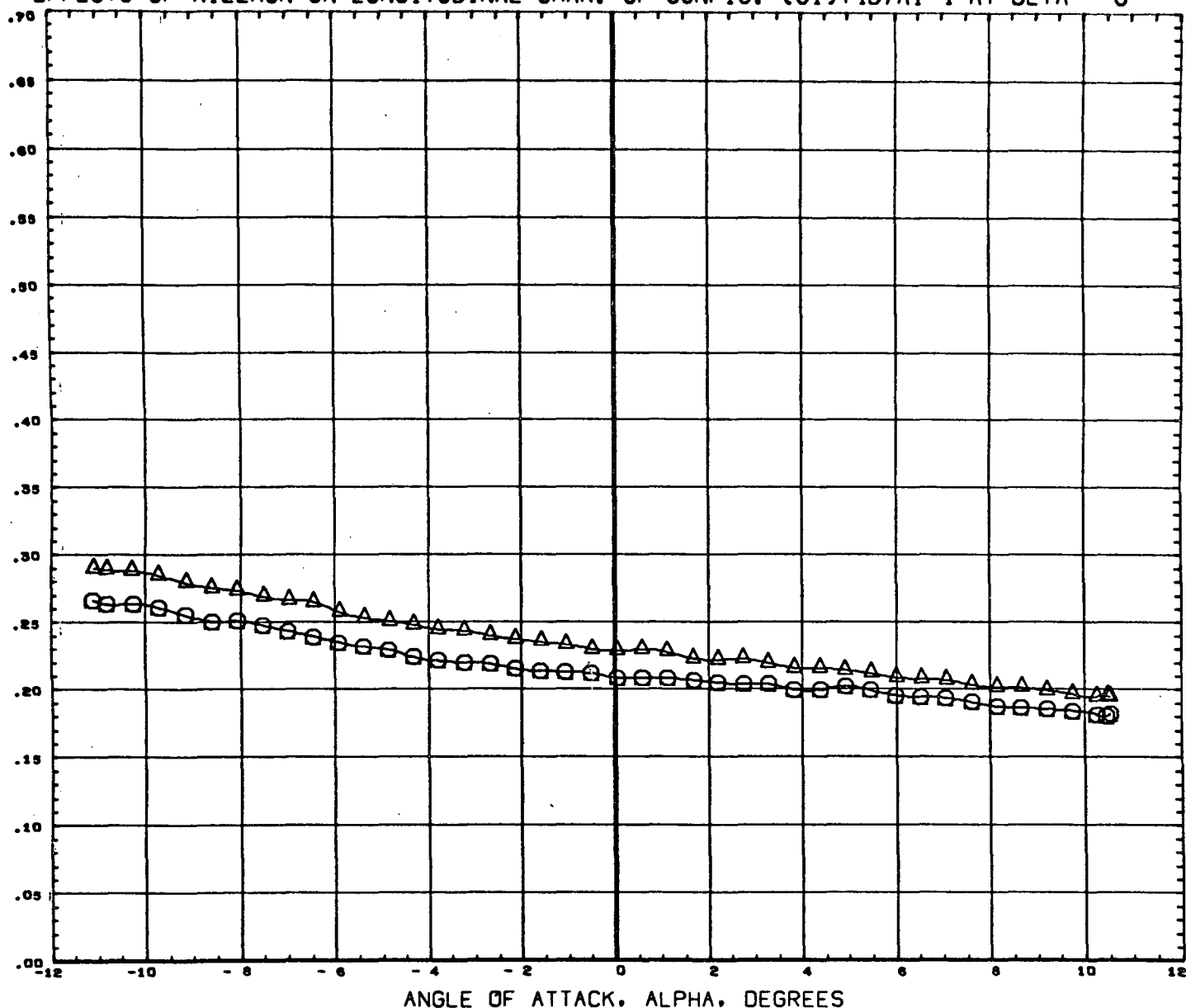
| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH .58

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

AXIAL FORCE COEFFICIENT, CA



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C9) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
(CD74D3) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

BETA ELEVTR AILRON RUDDER
6.000 0.000 0.000 0.000
6.000 0.000 20.000 0.000

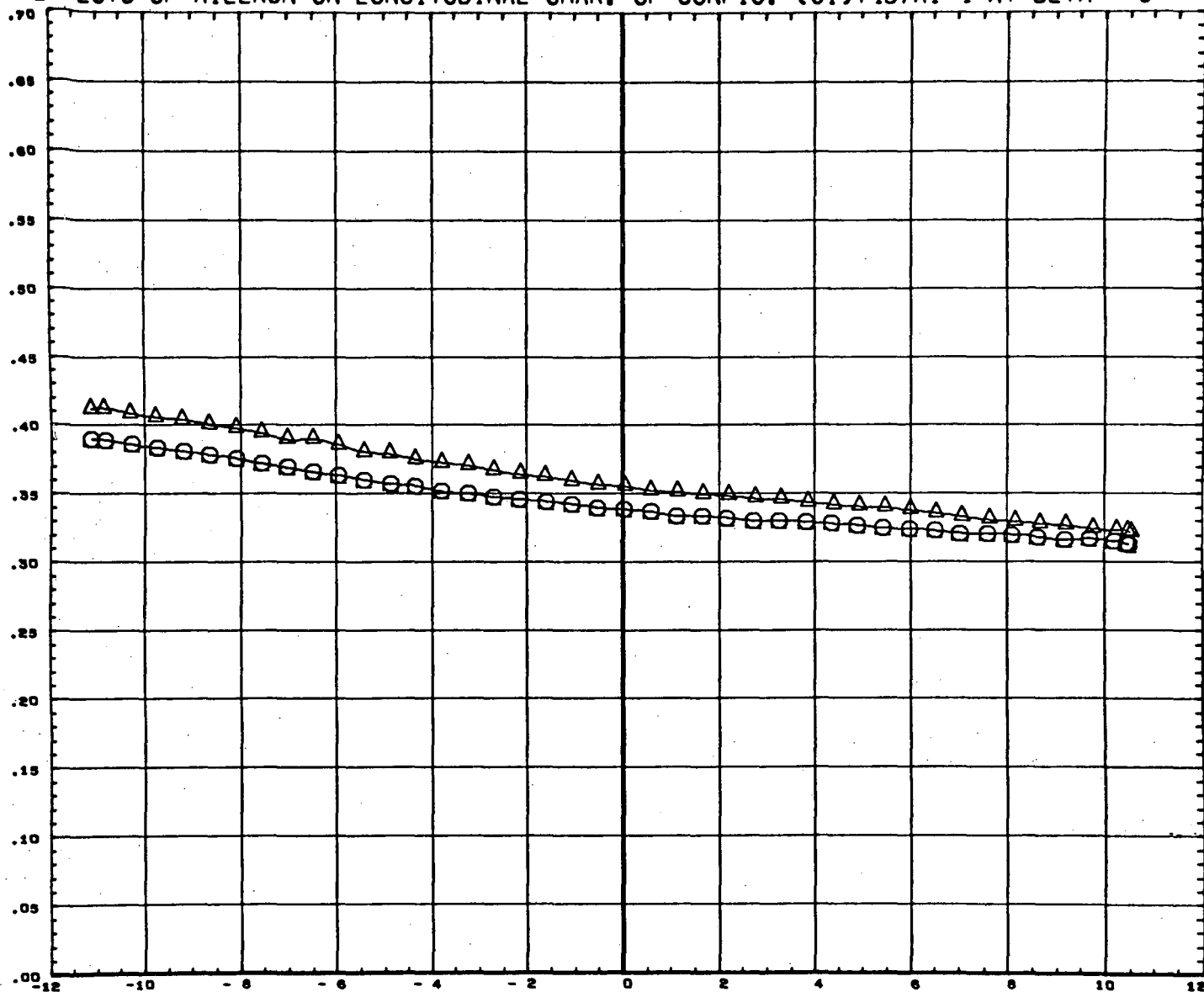
REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.9004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060 SCALE

MACH .90

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

AXIAL FORCE COEFFICIENT, CA



ANGLE OF ATTACK, ALPHA, DEGREES

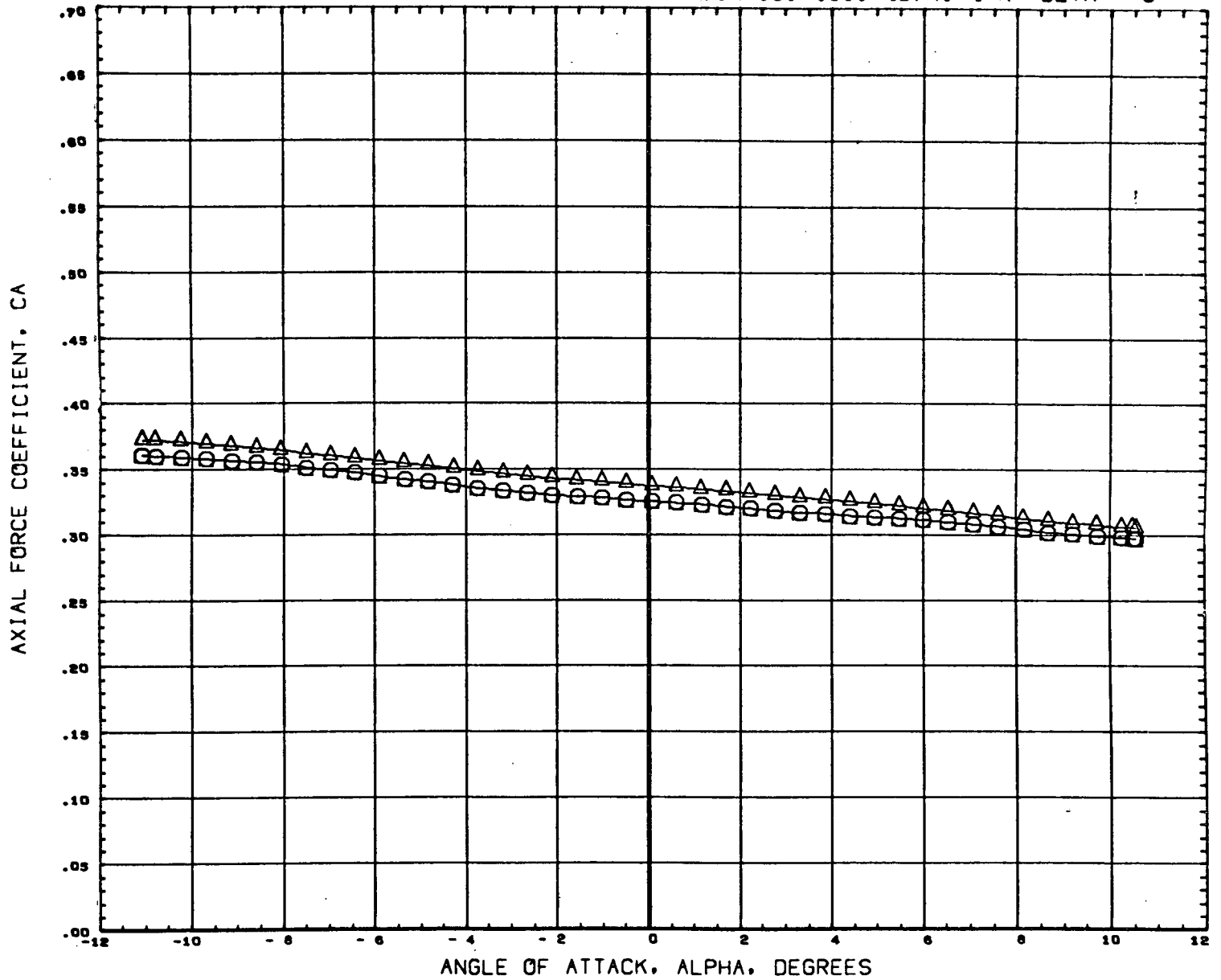
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (CD74D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 6.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 20.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH 1.10

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



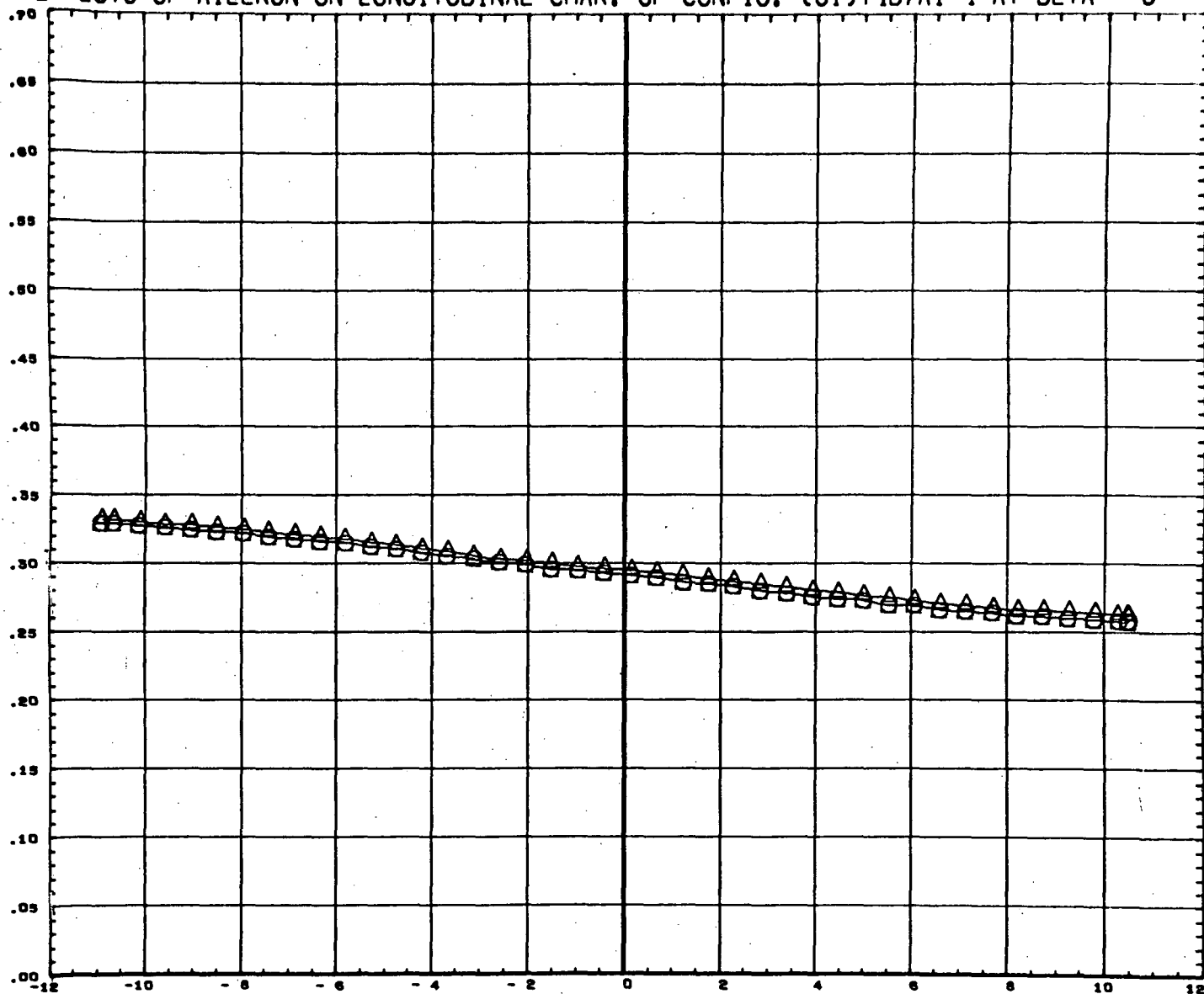
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.51

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

AXIAL FORCE COEFFICIENT, CA



ANGLE OF ATTACK, ALPHA, DEGREES

DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C9) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
(CD74D3) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 6.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 20.000 | 0.000 |

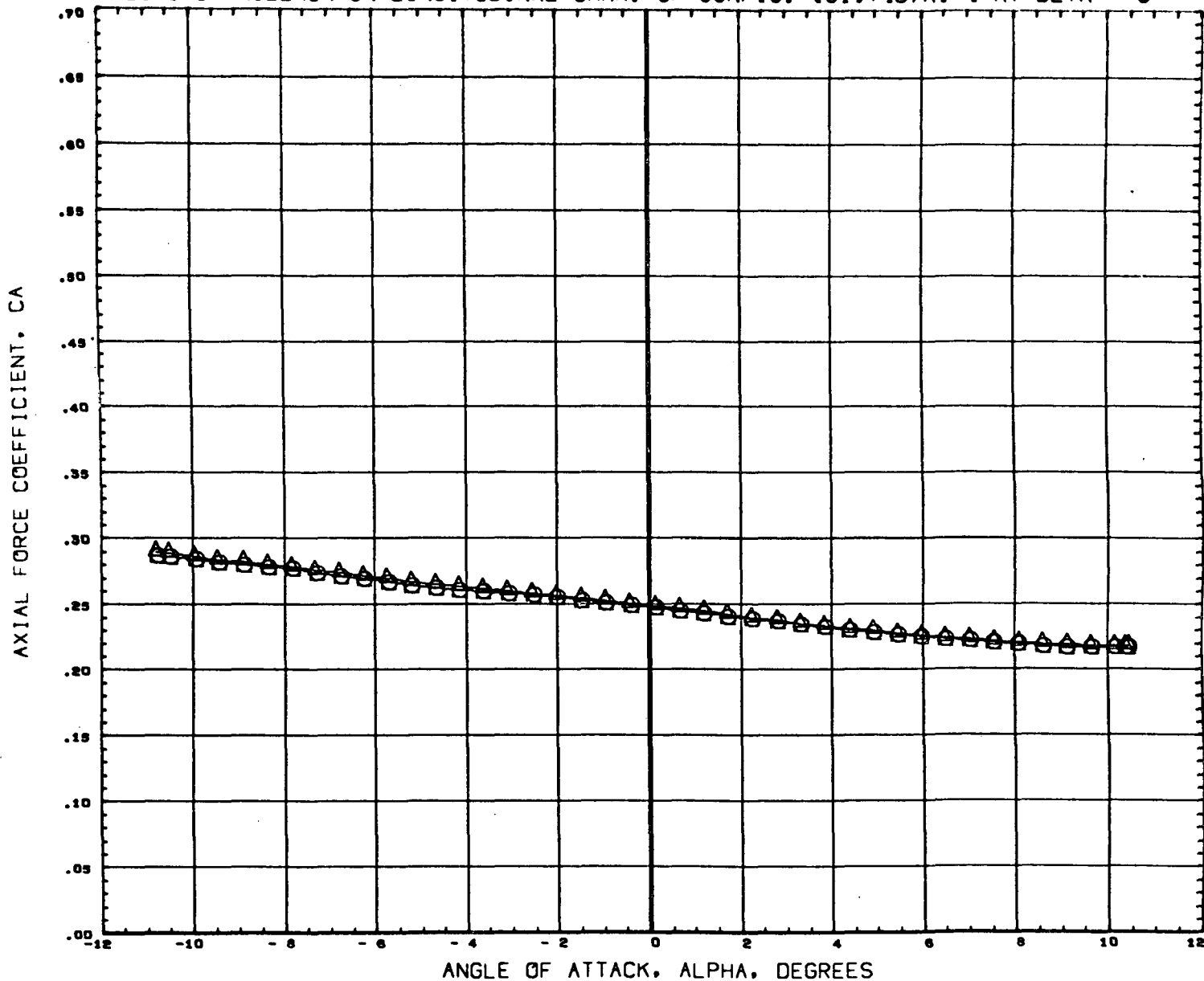
REFERENCE INFORMATION

| | | |
|-------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 2.20

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (O1)T4B7A1-4 AT BETA = 6



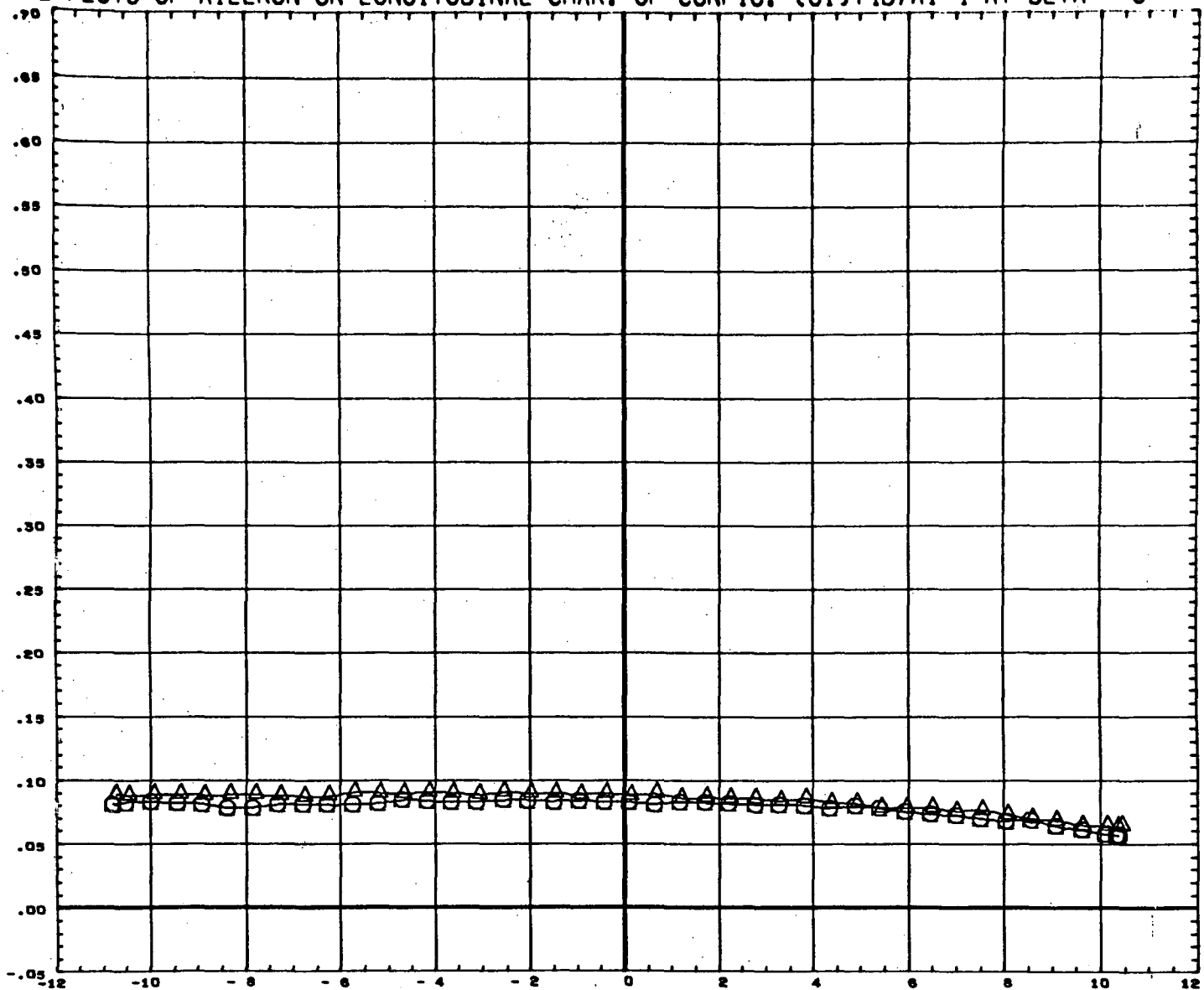
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D3) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 957.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47



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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

FOREBODY AXIAL FORCE COEFFICIENT, CAF



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C9)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74D3)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

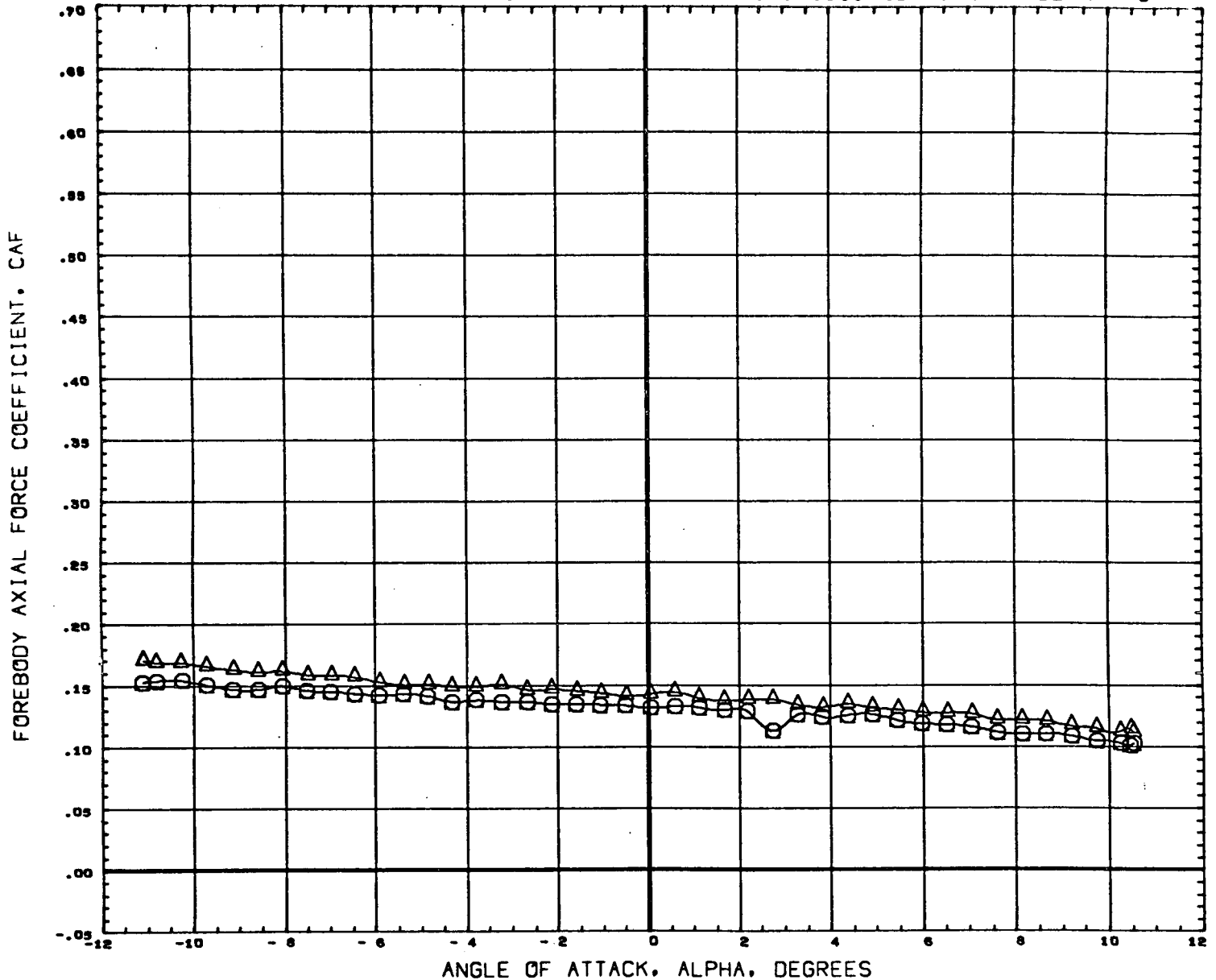
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 6.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 20.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH .58

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



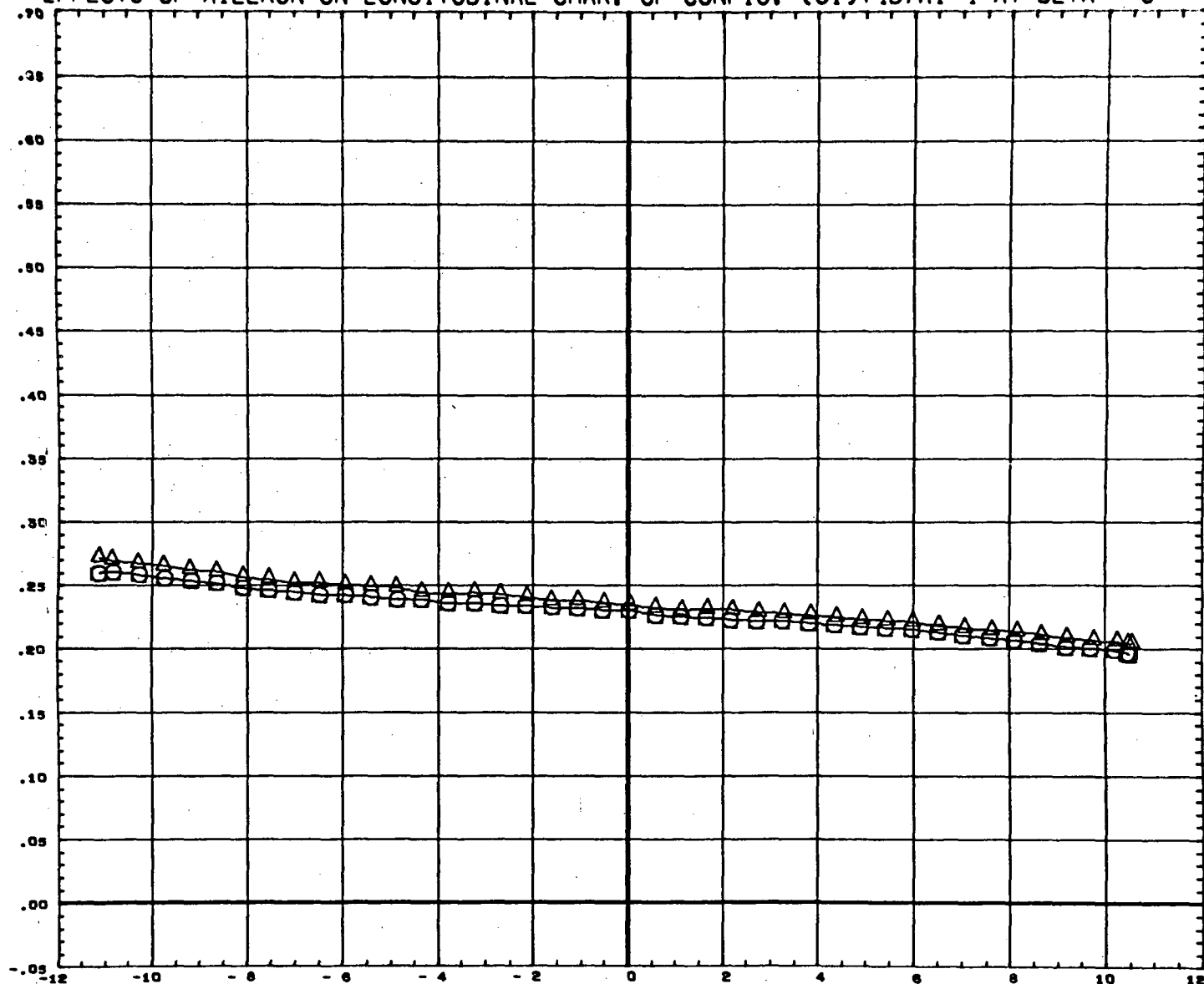
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D3) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.3004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRF | 557.0004 IN. |
| | | | | | | YMRF | 0.0000 IN. |
| | | | | | | ZMRF | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

FOREBODY AXIAL FORCE COEFFICIENT, CAF



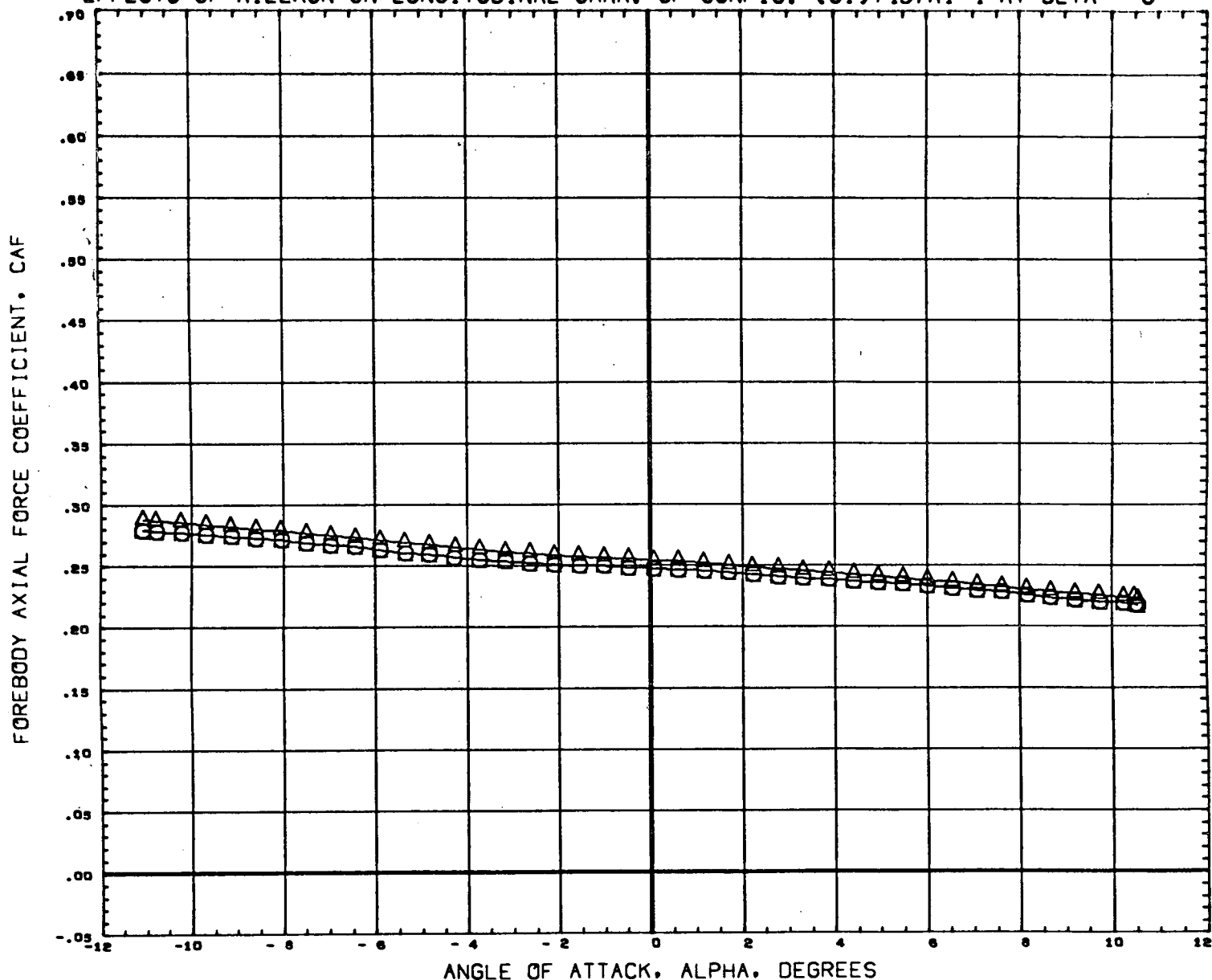
ANGLE OF ATTACK, ALPHA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRF | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.10

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



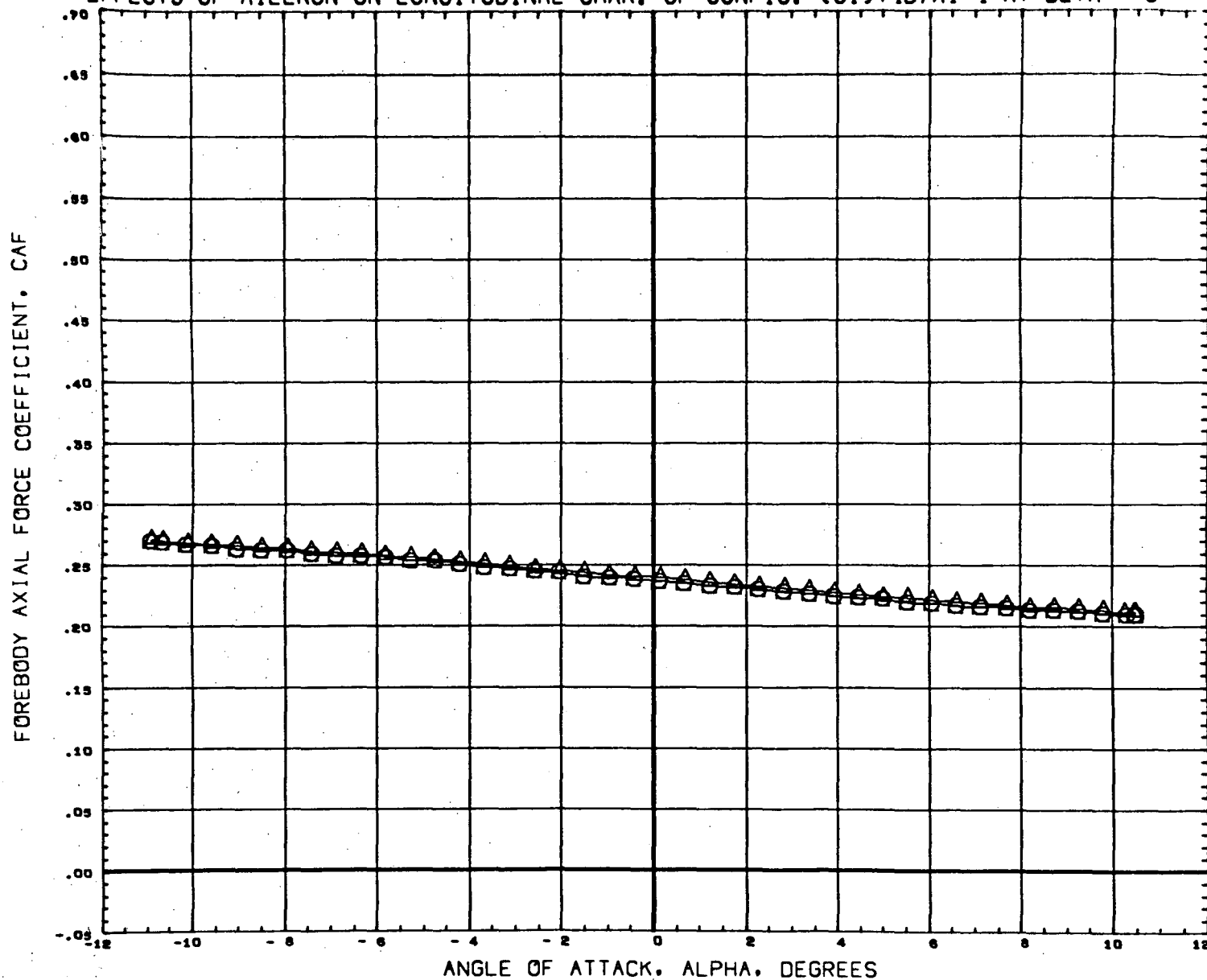
| DATA SET, SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|------------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (C074C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (C074D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH

1.51

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

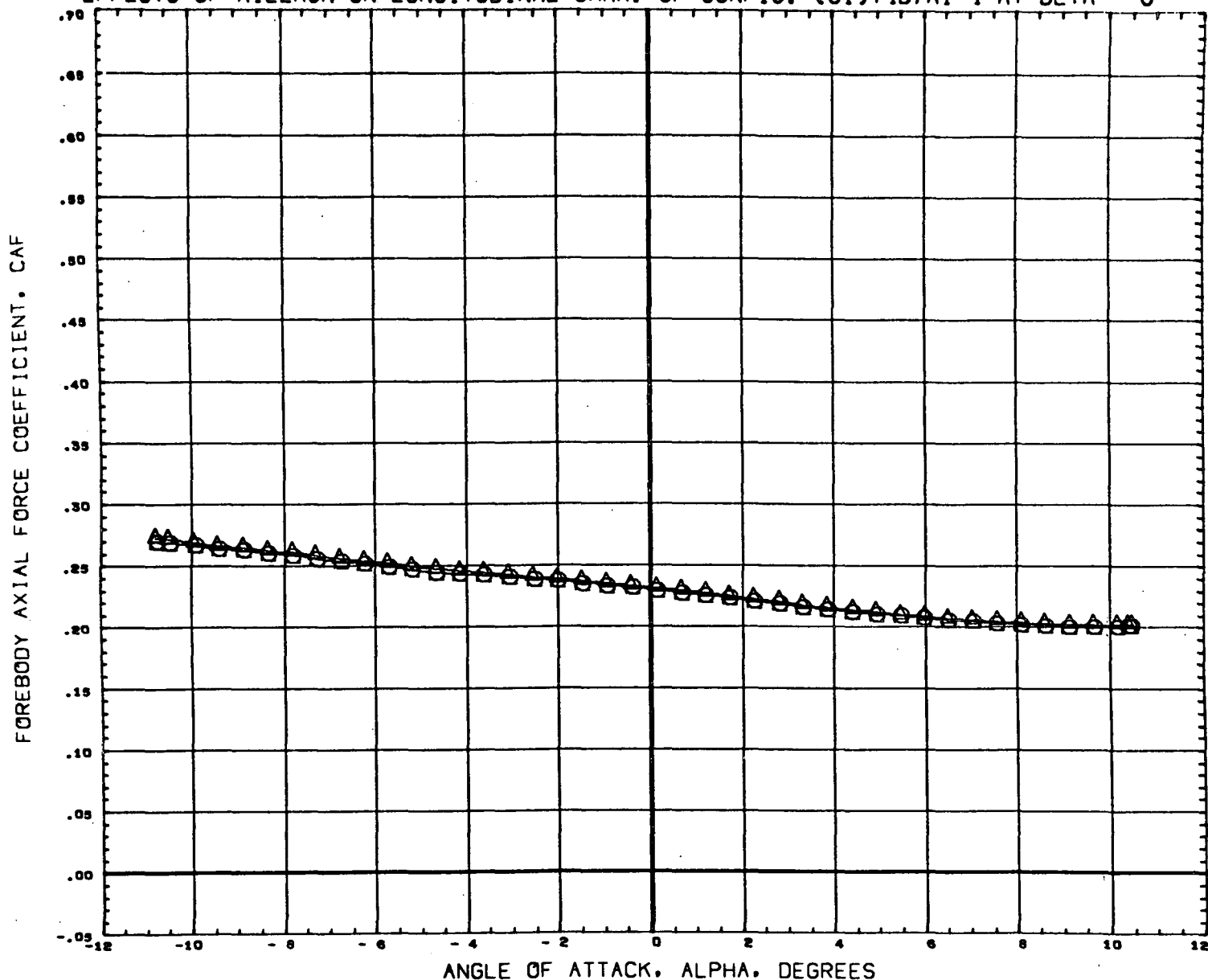


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

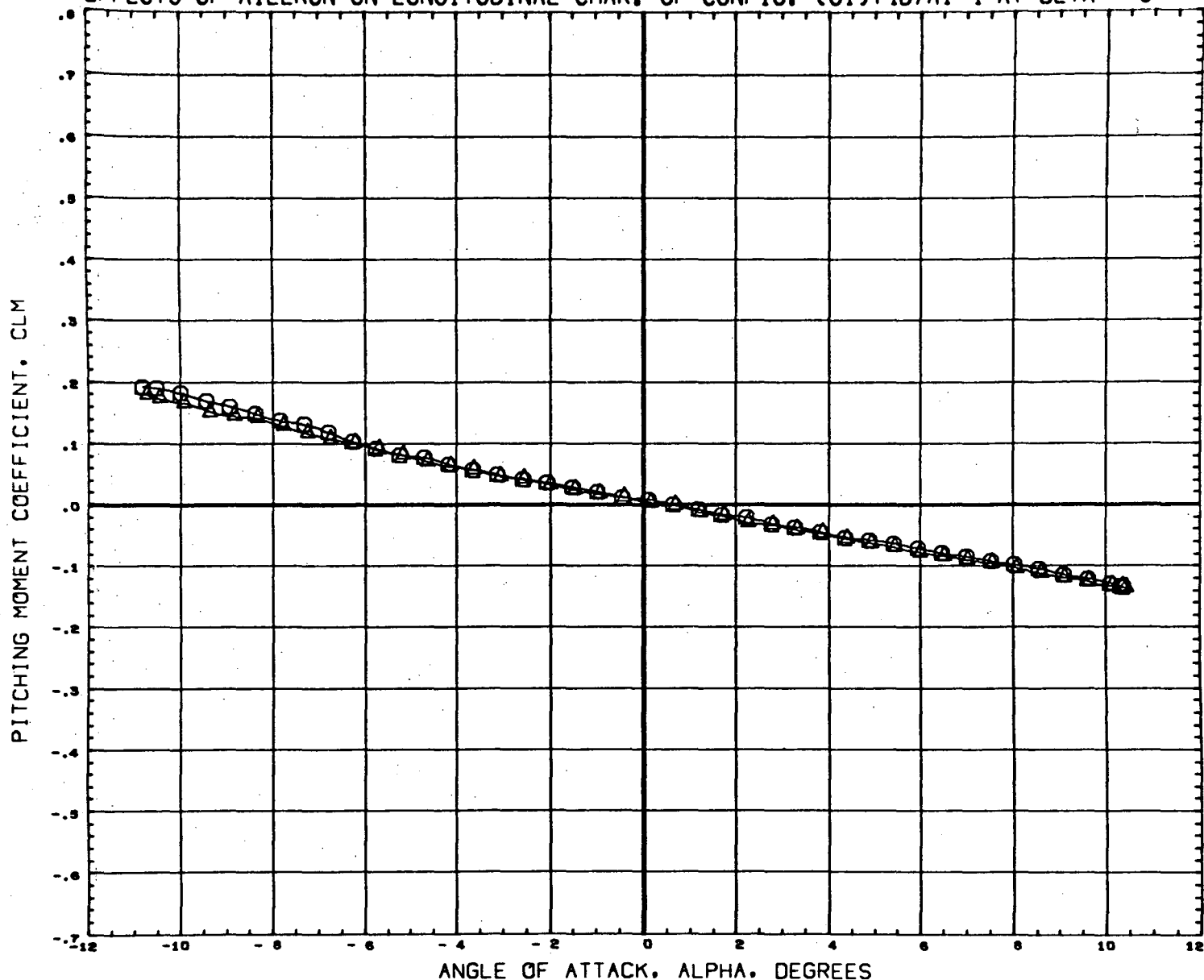


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D3) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C9) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74D3) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

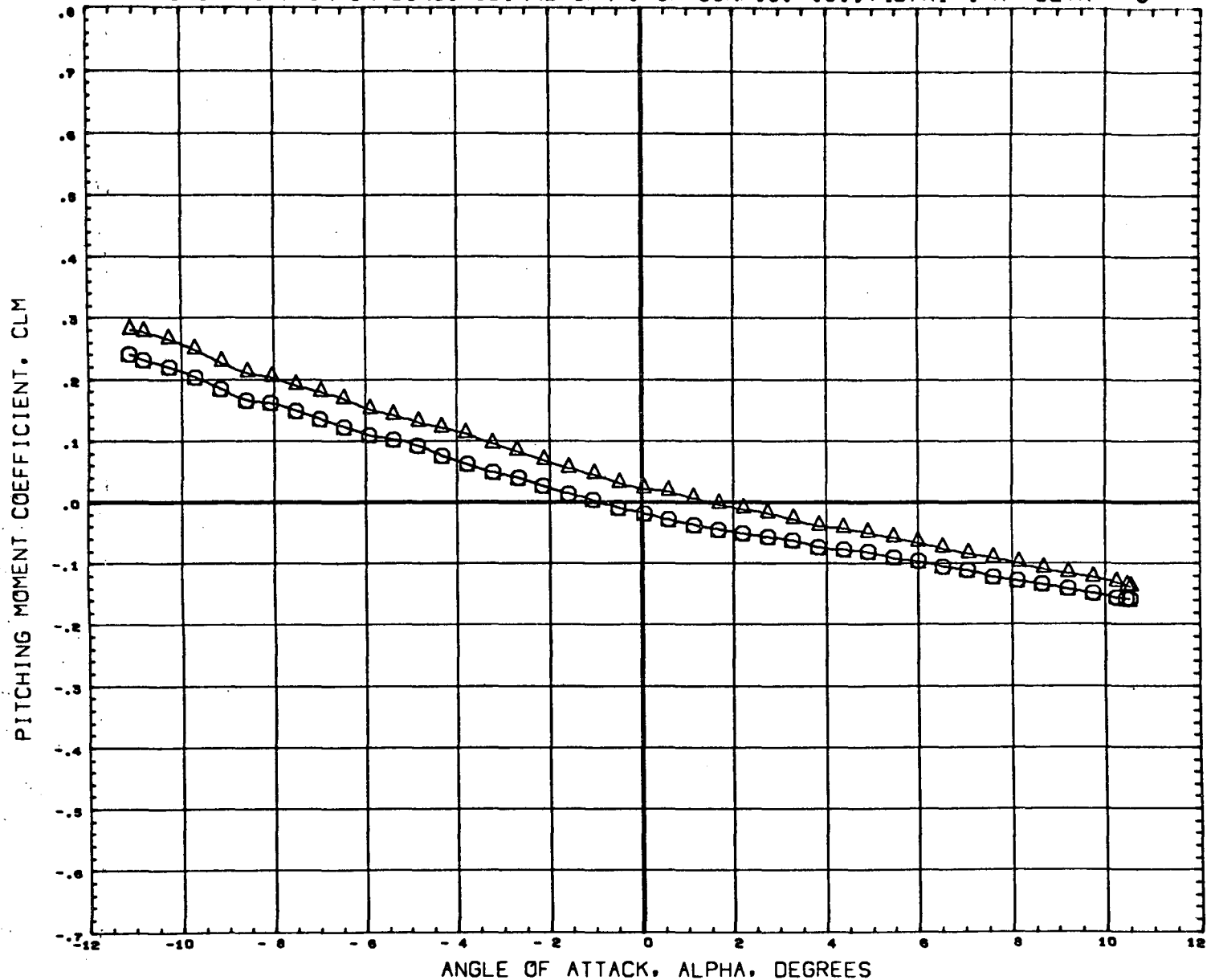
| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRF | 557.0004 IN. |
| | | | | YMRF | 0.0000 IN. |
| | | | | ZMRF | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH

.58

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C9) ○ MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
 (CD74D3) △ MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

BETA ELEVTR AILERON RUDDER
 6.000 0.000 0.000 0.000
 6.000 0.000 20.000 0.000

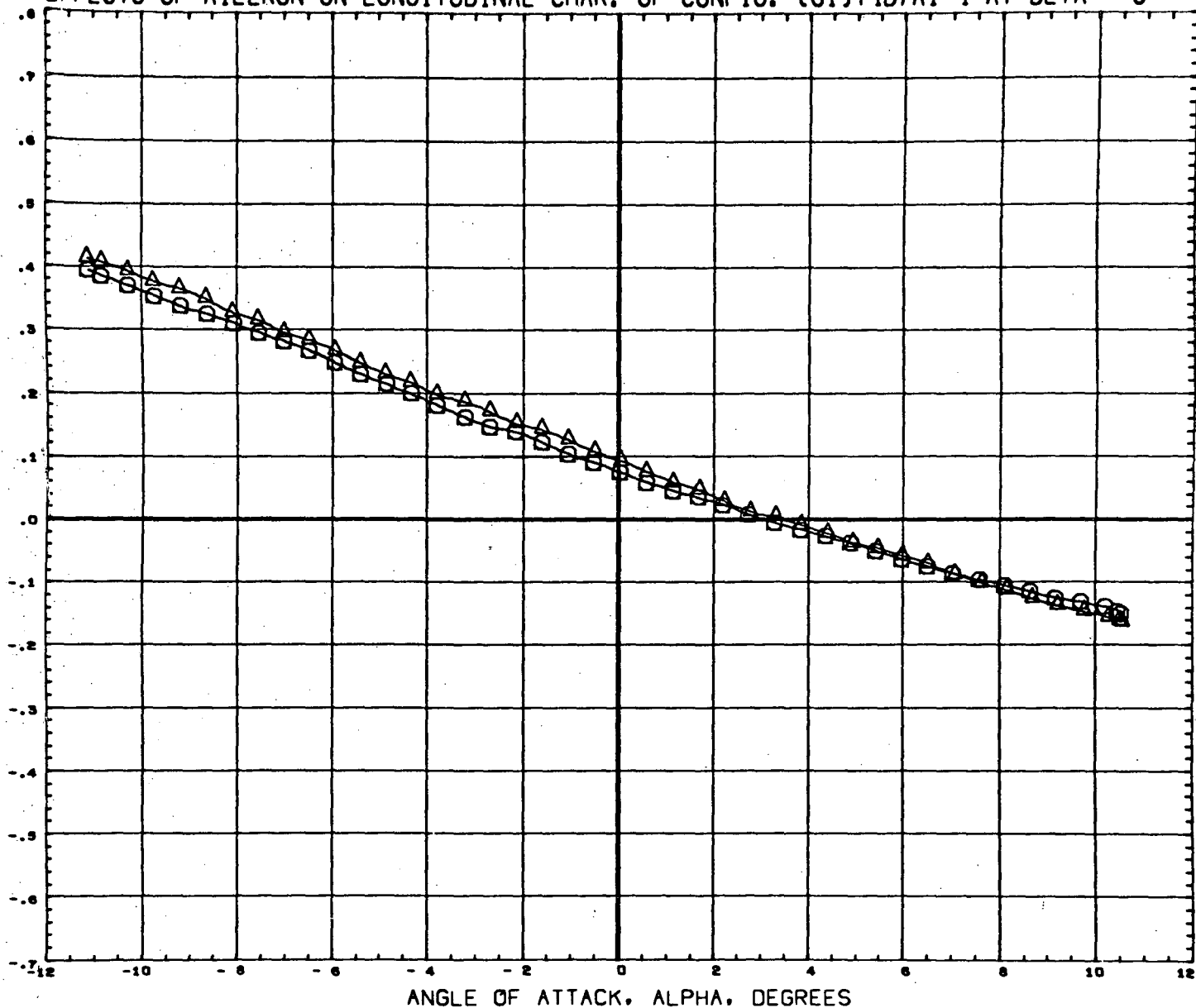
REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.3004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH .90

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

PITCHING MOMENT COEFFICIENT, CLM



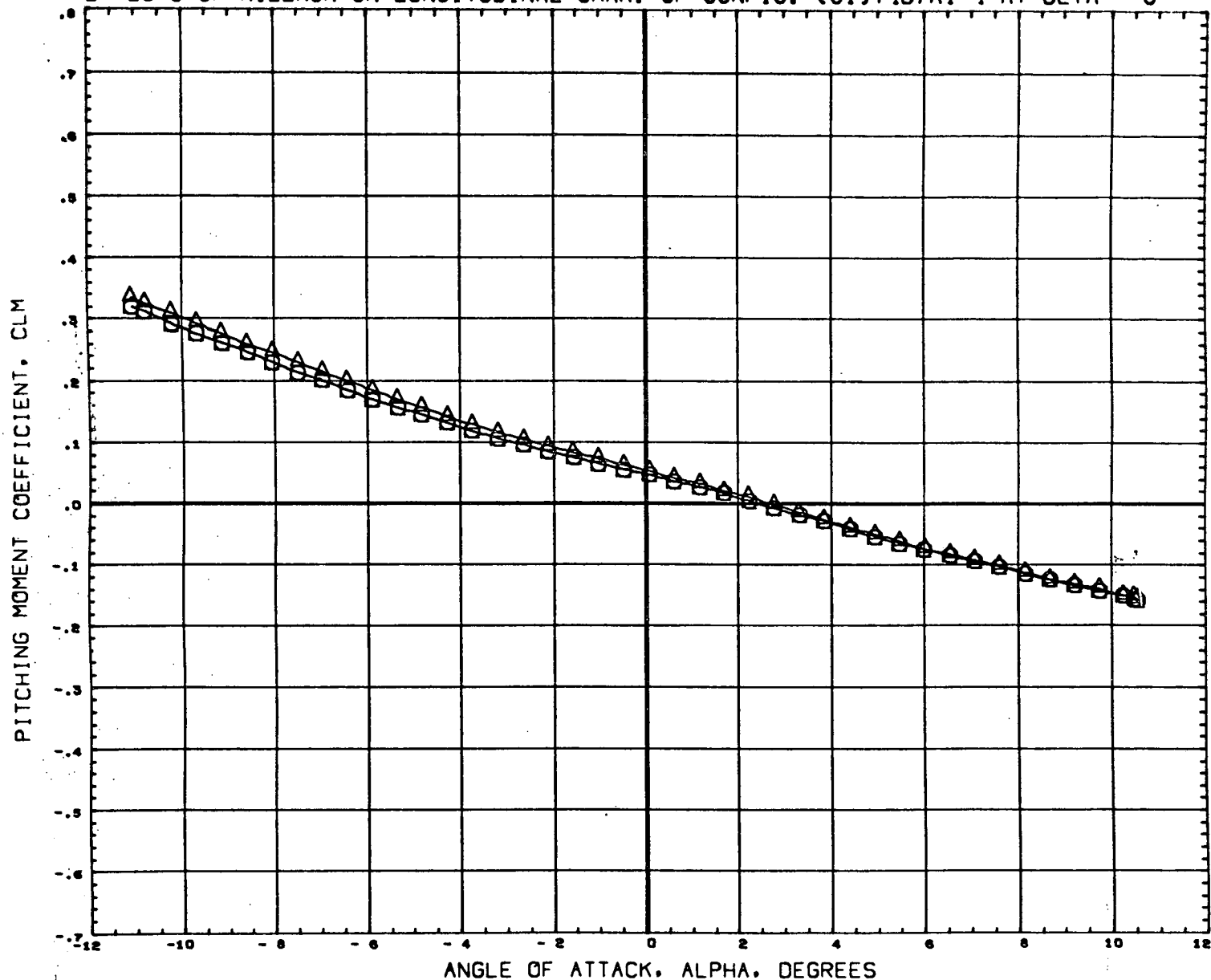
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (CD74D3) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 6.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 20.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 682.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH 1.10

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C9) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74D3) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

BETA ELEVTR AILRON RUDDER
 6.000 0.000 0.000 0.000
 6.000 0.000 20.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

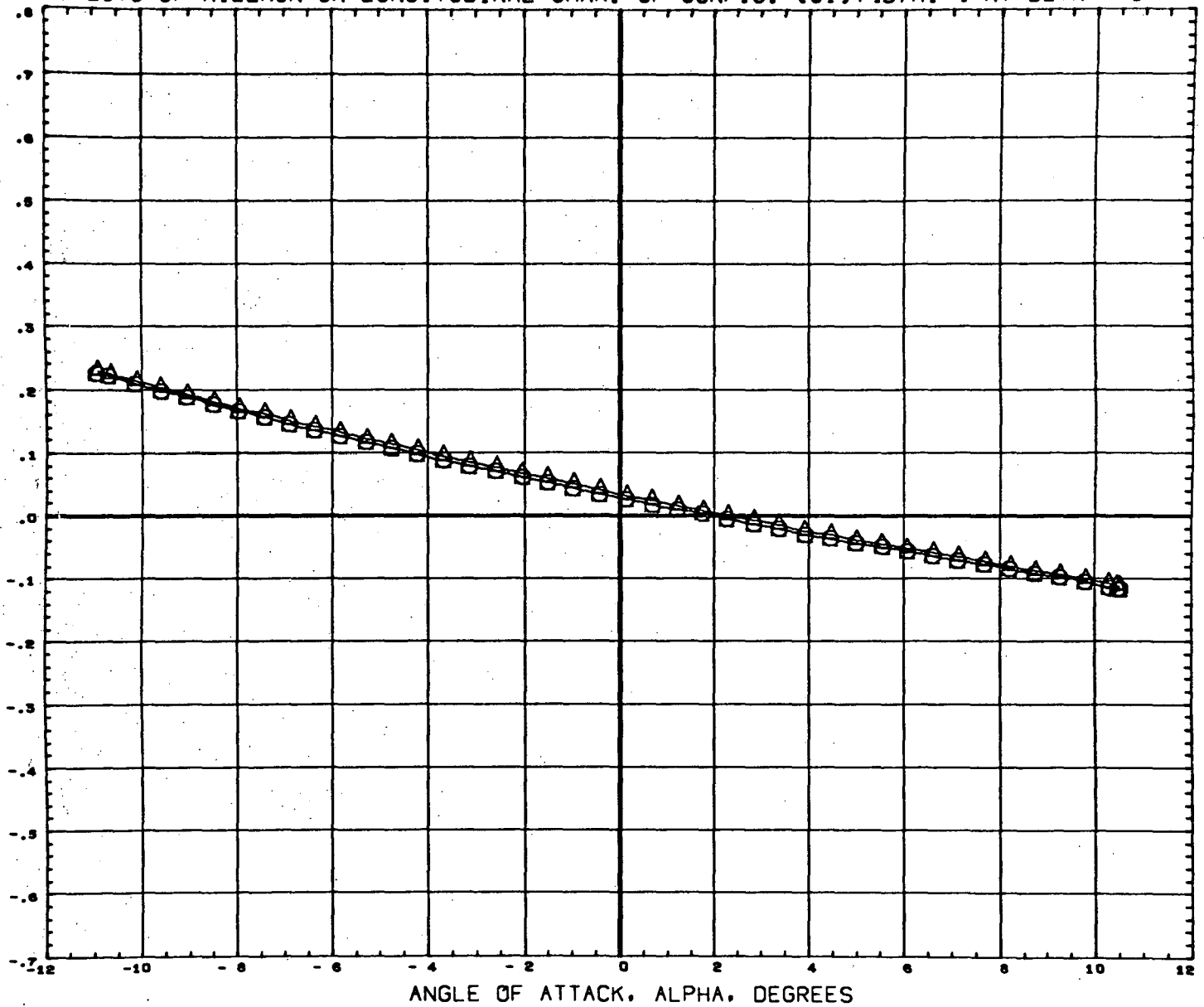
MACH

1.51



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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

PITCHING MOMENT COEFFICIENT, CLM



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C9)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD7403)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

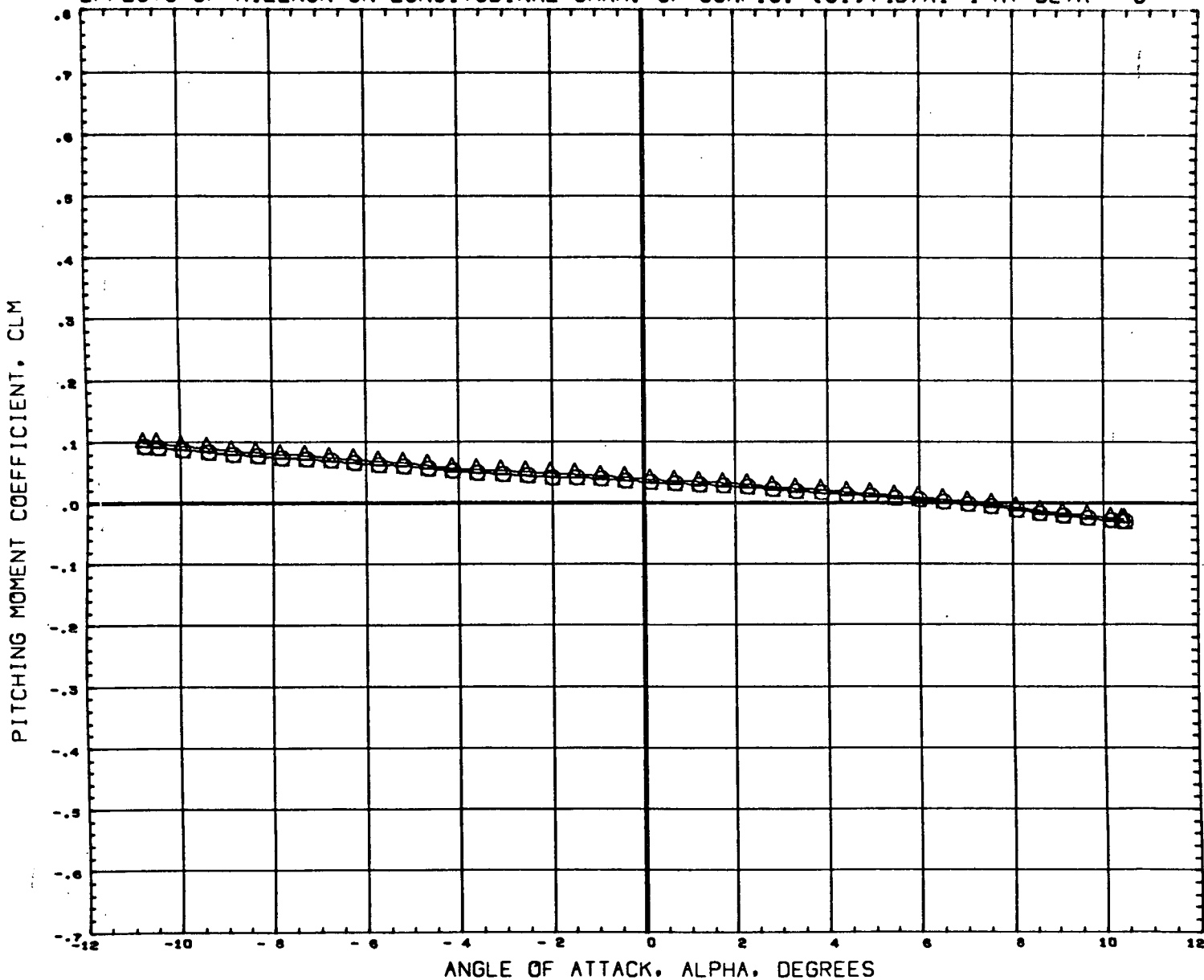
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 6.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 20.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 957.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 2.20

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



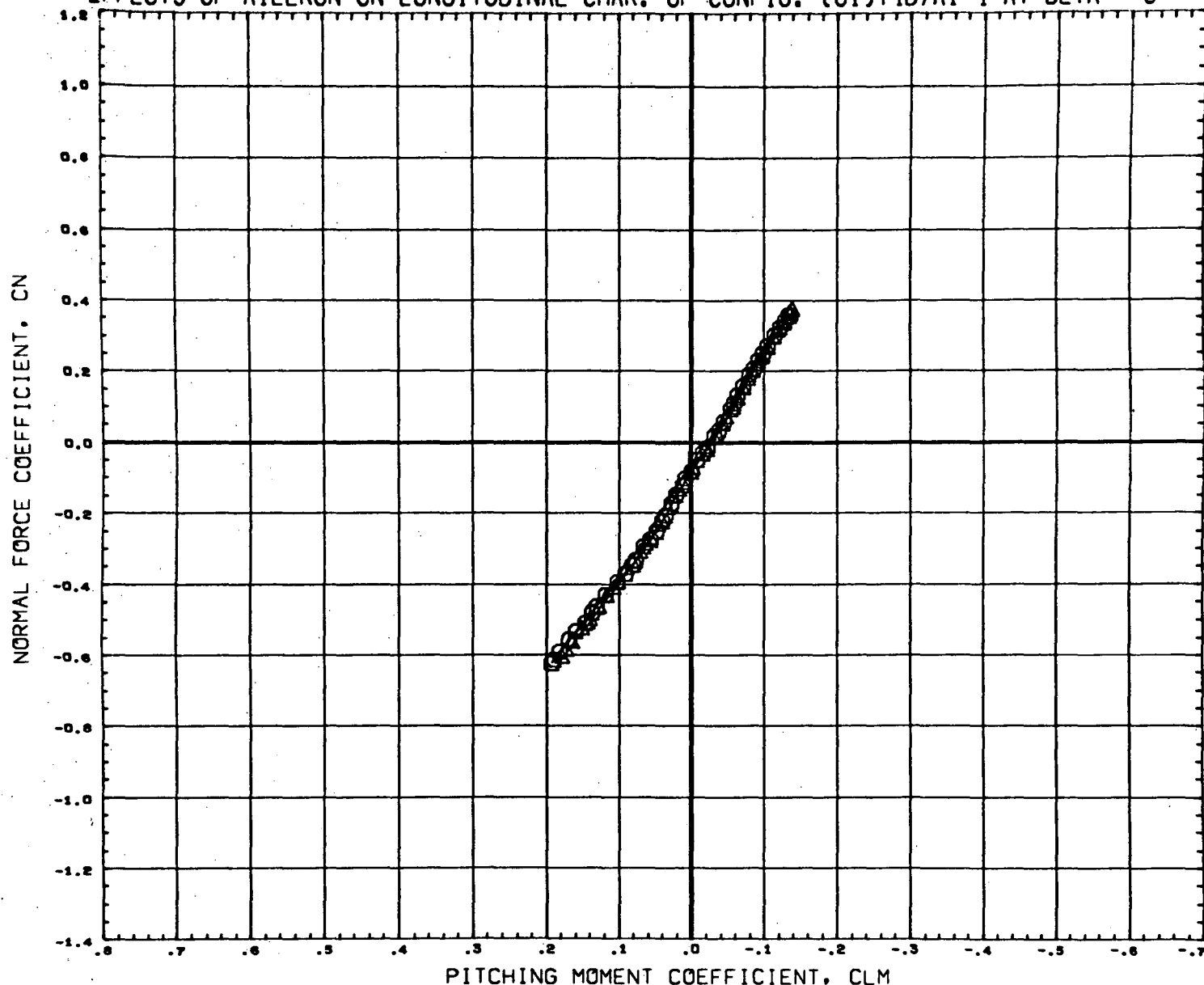
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (C074C9) | MDAC S-222 COMPOSITE (T-C6) (01)T4B7A1-4 |
| (C074D3) | MDAC S-222 COMPOSITE (T-C6) (01)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 6.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 20.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH 4.47

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

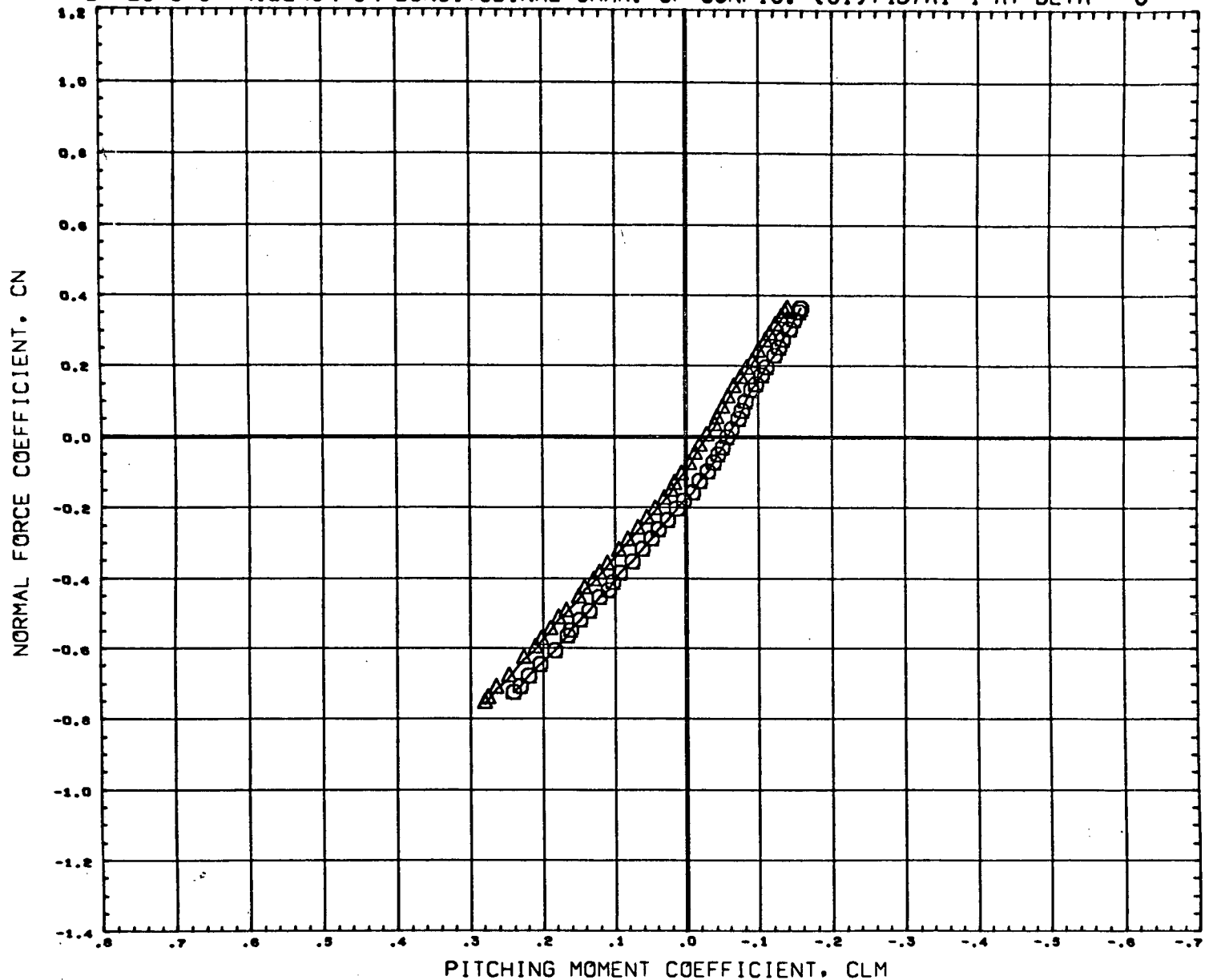


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D3) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C9) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
 (CD74D3) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

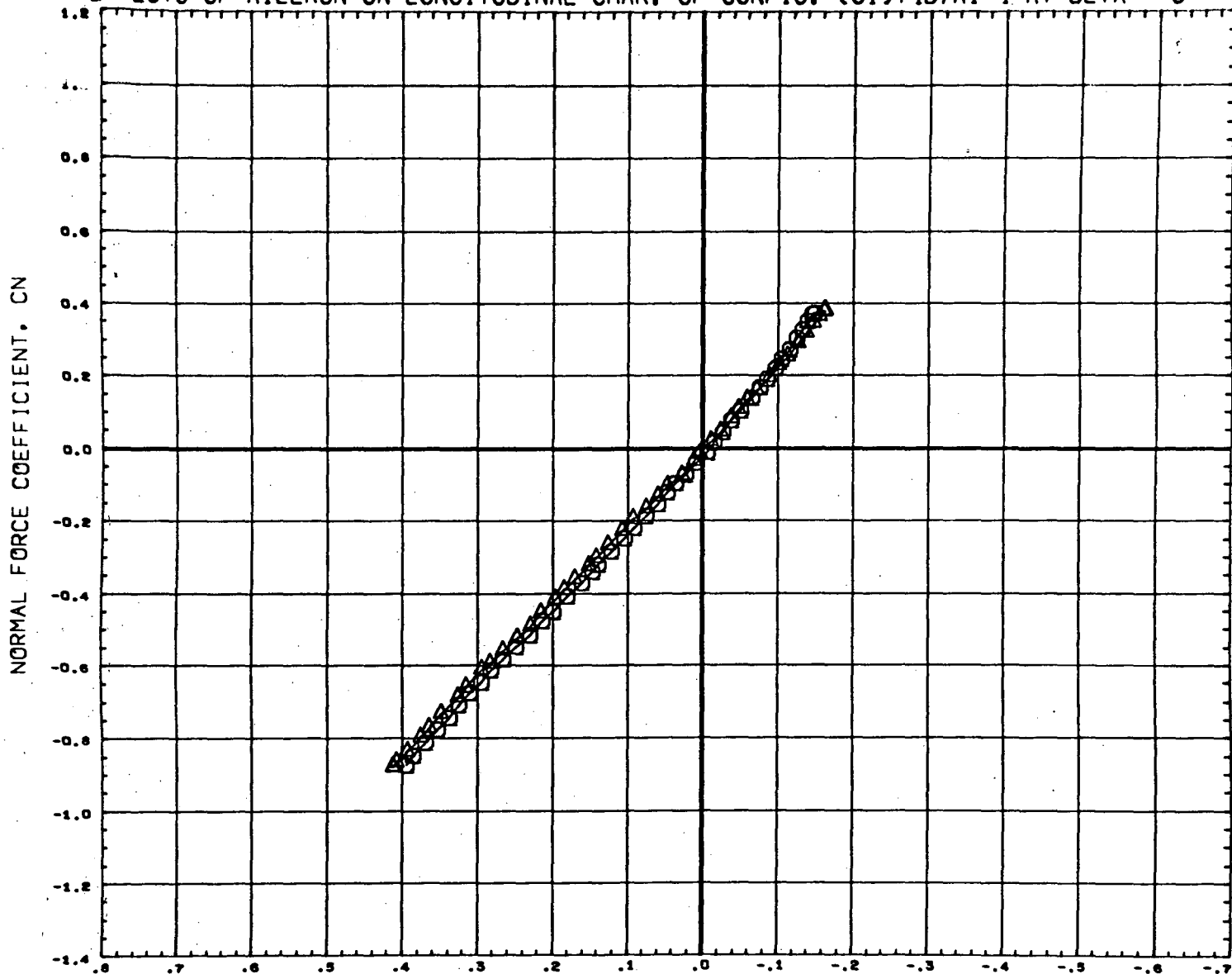
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 6.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 20.000 | 0.000 |

| REFERENCE INFORMATION | |
|-----------------------|------------------|
| SREF | 3155.3040 SQ.FT. |
| LREF | 609.5004 IN. |
| BREF | 882.0004 IN. |
| XMRP | 557.0004 IN. |
| YMRP | 0.0000 IN. |
| ZMRP | 200.0004 IN. |
| SCALE | 0.0060 SCALE |

MACH .90

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

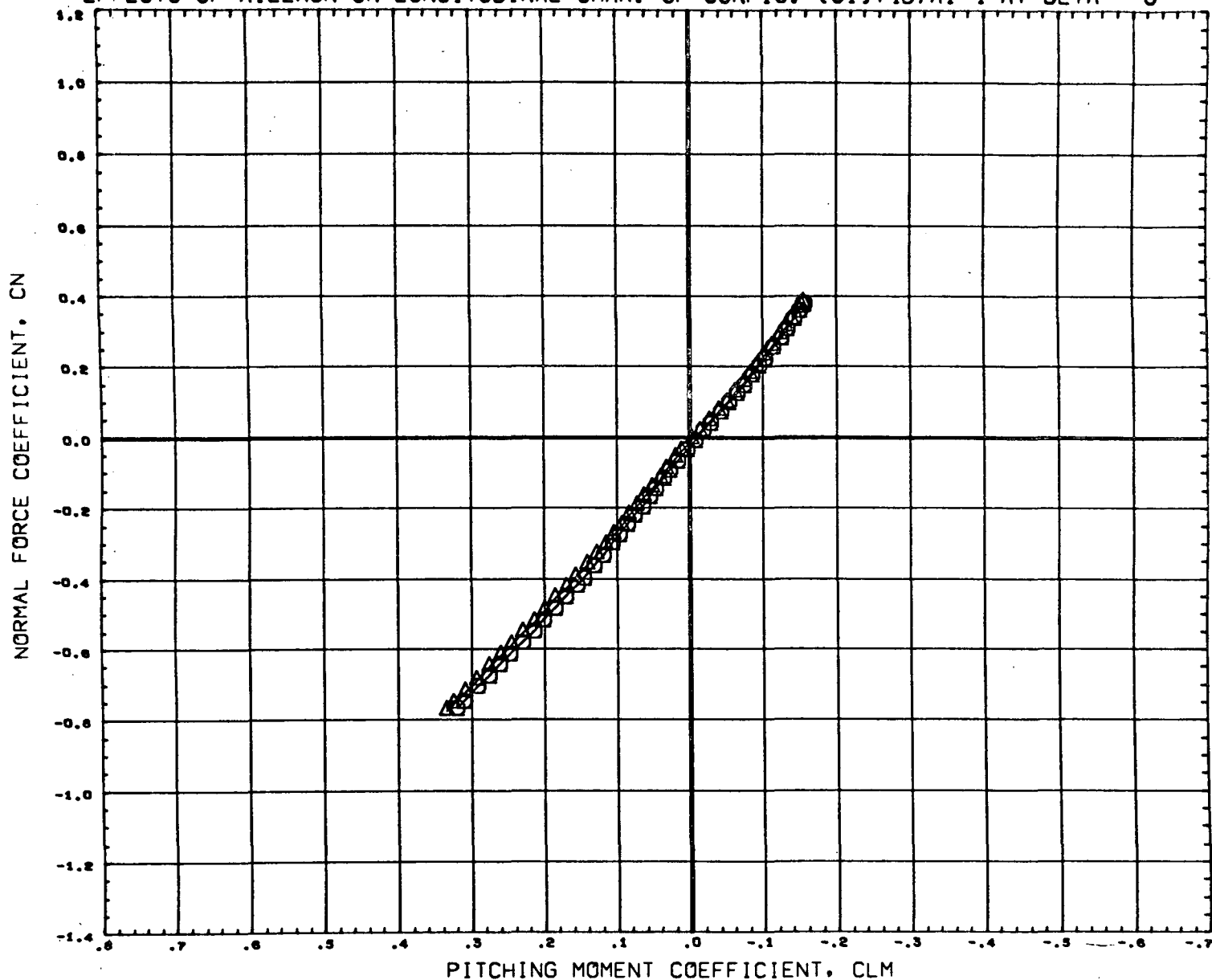


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 5155.3040 SQ.FT. |
| (CD74D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 682.0004 IN. |
| | | | | | | XMRP | 937.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.10

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



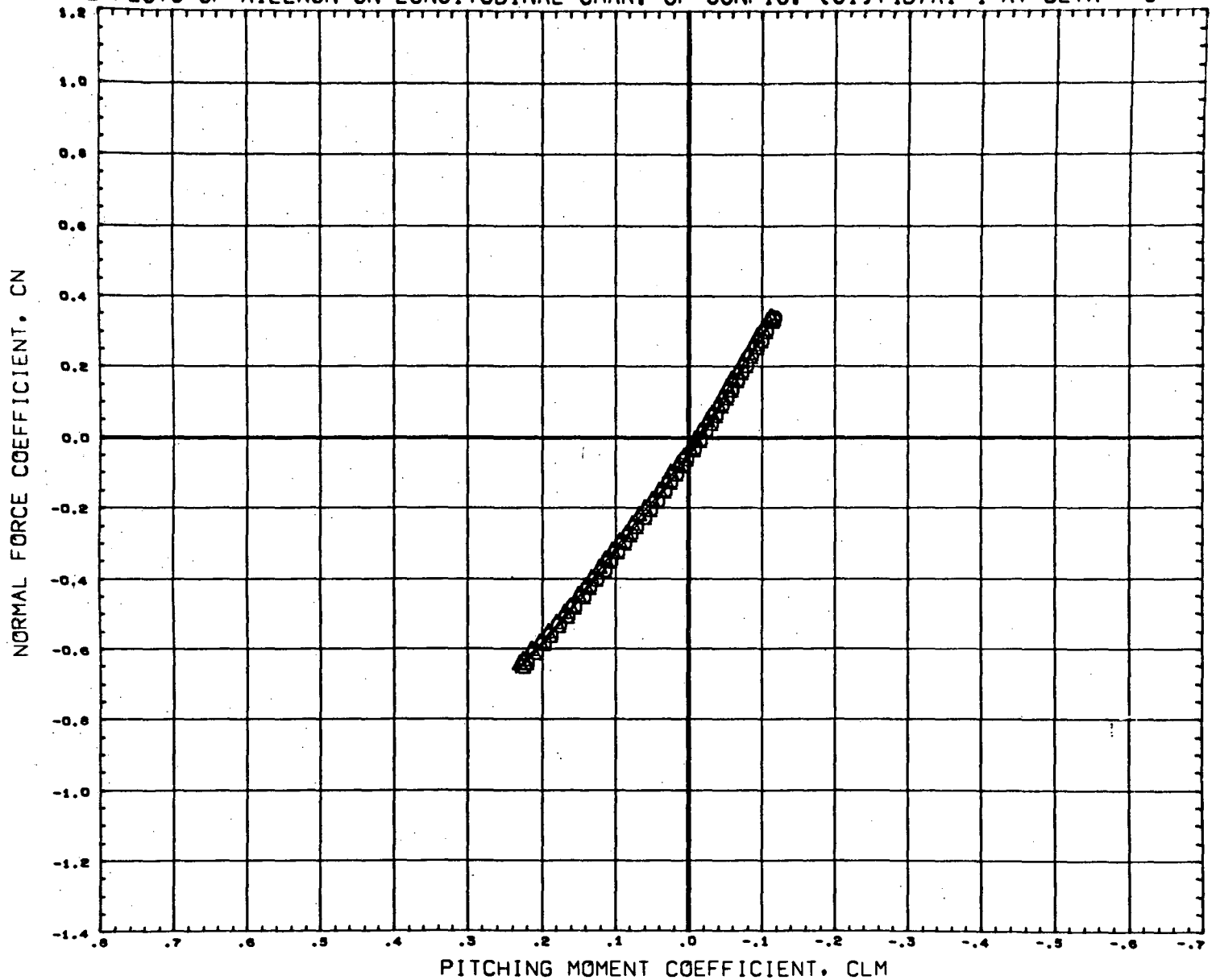
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (C074C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (C074D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-------|--------|--------|--------|-----------------------|-----------|--------|
| 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| 6.000 | 0.000 | 20.000 | 0.000 | LREF | 809.5004 | IN. |
| | | | | BREF | 882.0004 | IN. |
| | | | | XMRP | 537.0004 | IN. |
| | | | | YMRP | 0.0000 | IN. |
| | | | | ZMRP | 200.0004 | IN. |
| | | | | SCALE | 0.0060 | SCALE |

MACH 1.51

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C9) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74D3) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

BETA ELEVTR AILRON RUDDER

6.000 0.000 0.000 0.000
 6.000 0.000 20.000 0.000

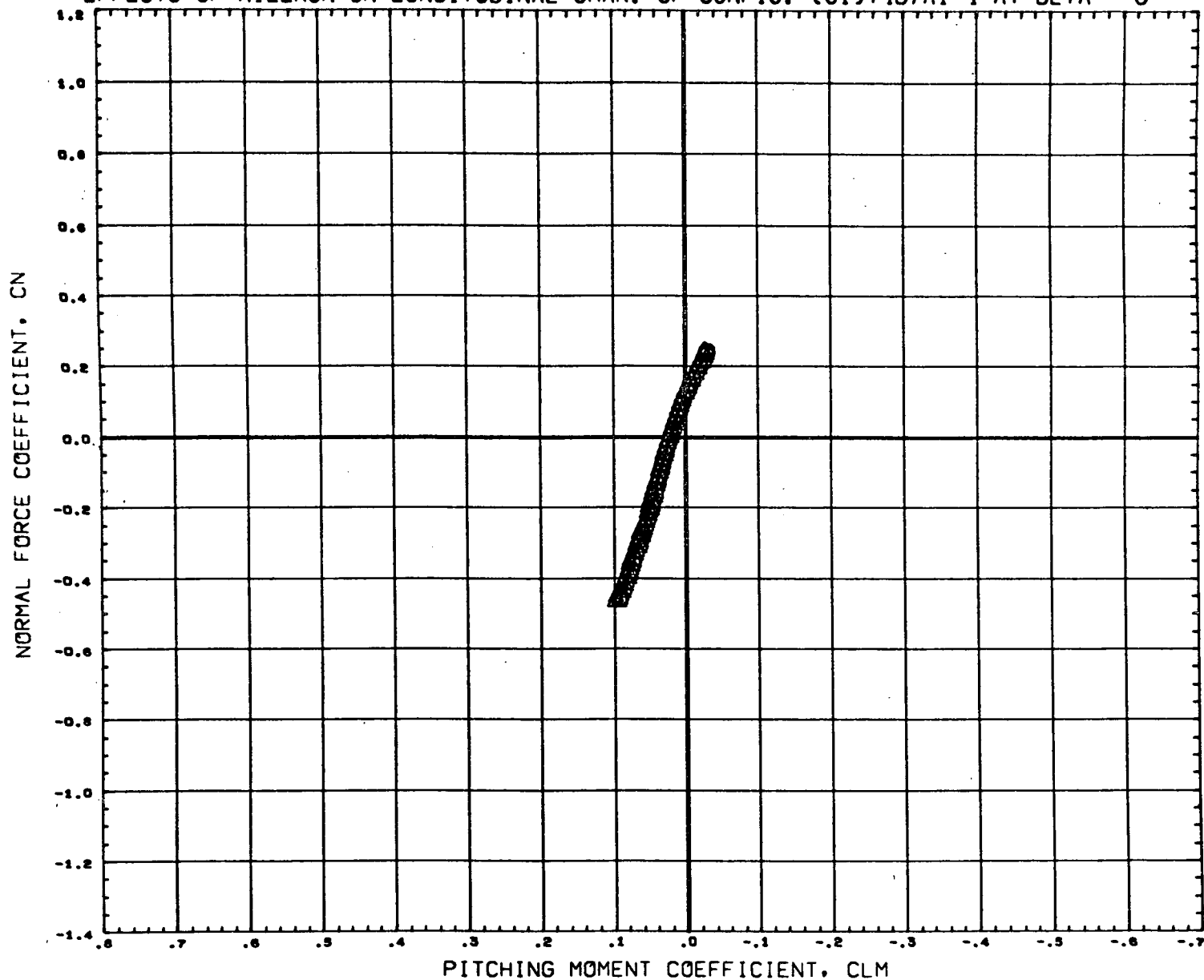
REFERENCE INFORMATION

SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 662.0004 IN.
 XMRP 957.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH 2.20

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

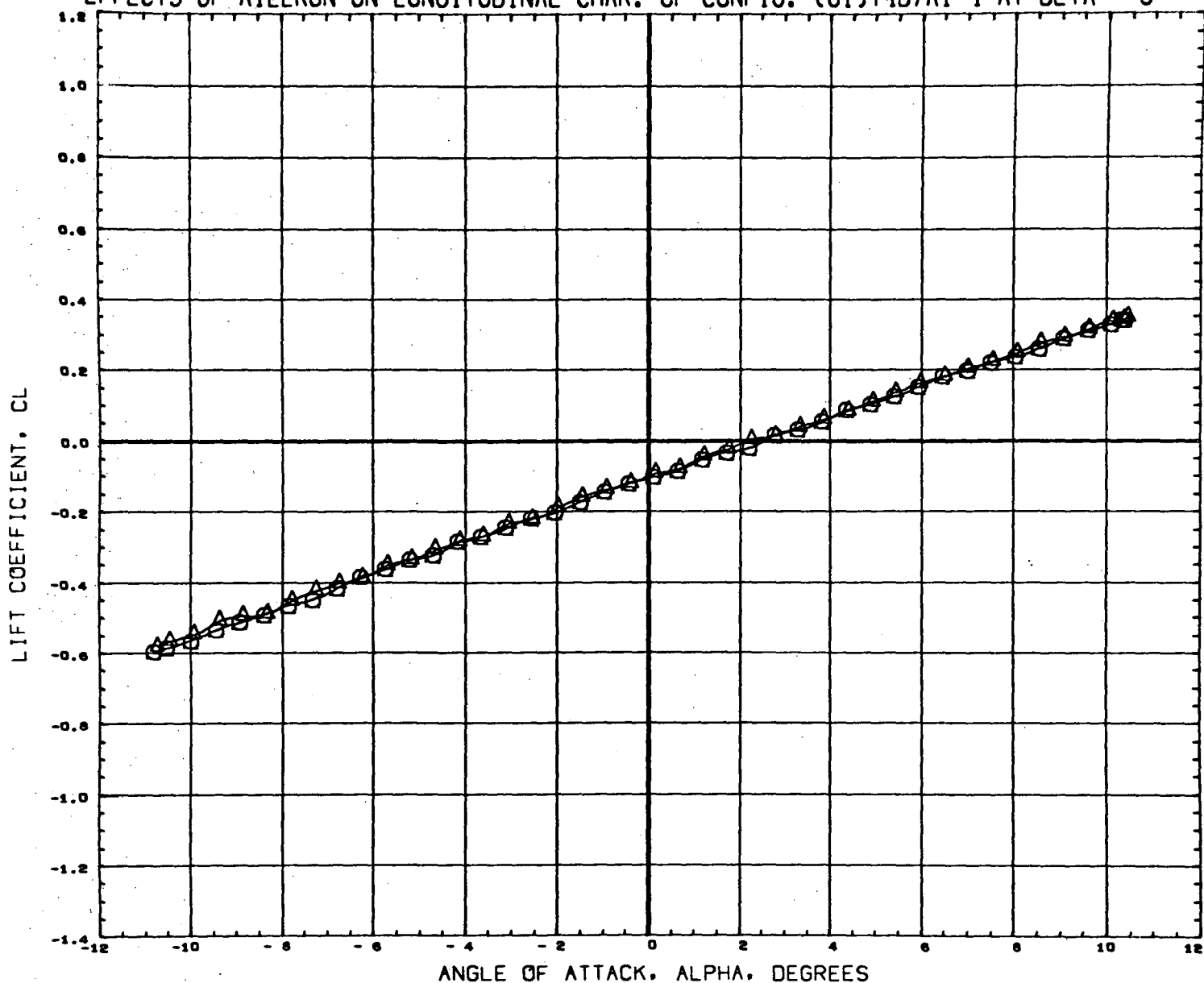


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3193.3040 SQ.FT. |
| (CD74D3) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C9) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
 (CD74D3) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

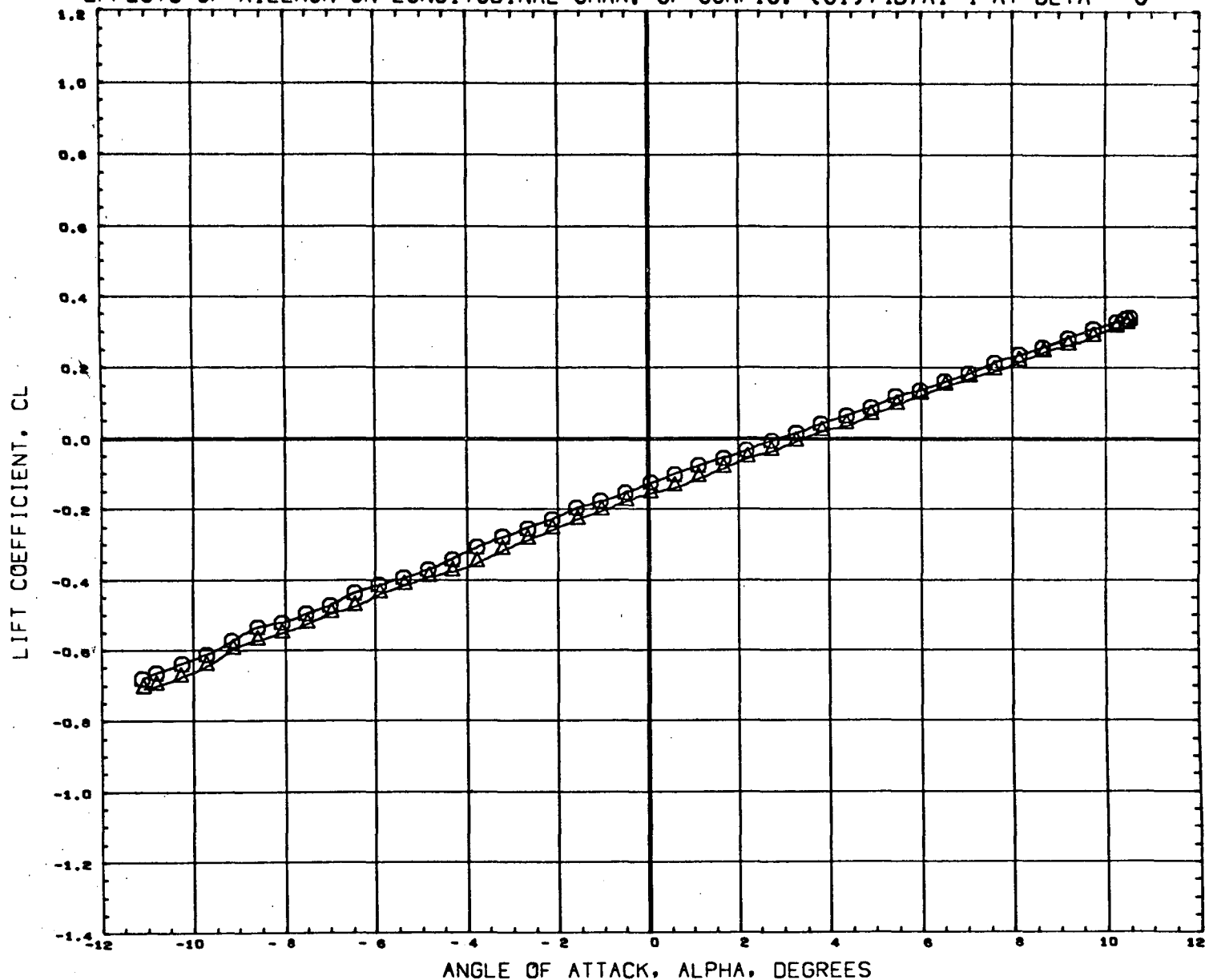
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 6.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 20.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 682.0004 | IN. |
| YMRP | 557.0004 | IN. |
| ZMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0080 | SCALE |

MACH .58

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C9) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
 (CD74D3) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 6.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 20.000 | 0.000 |

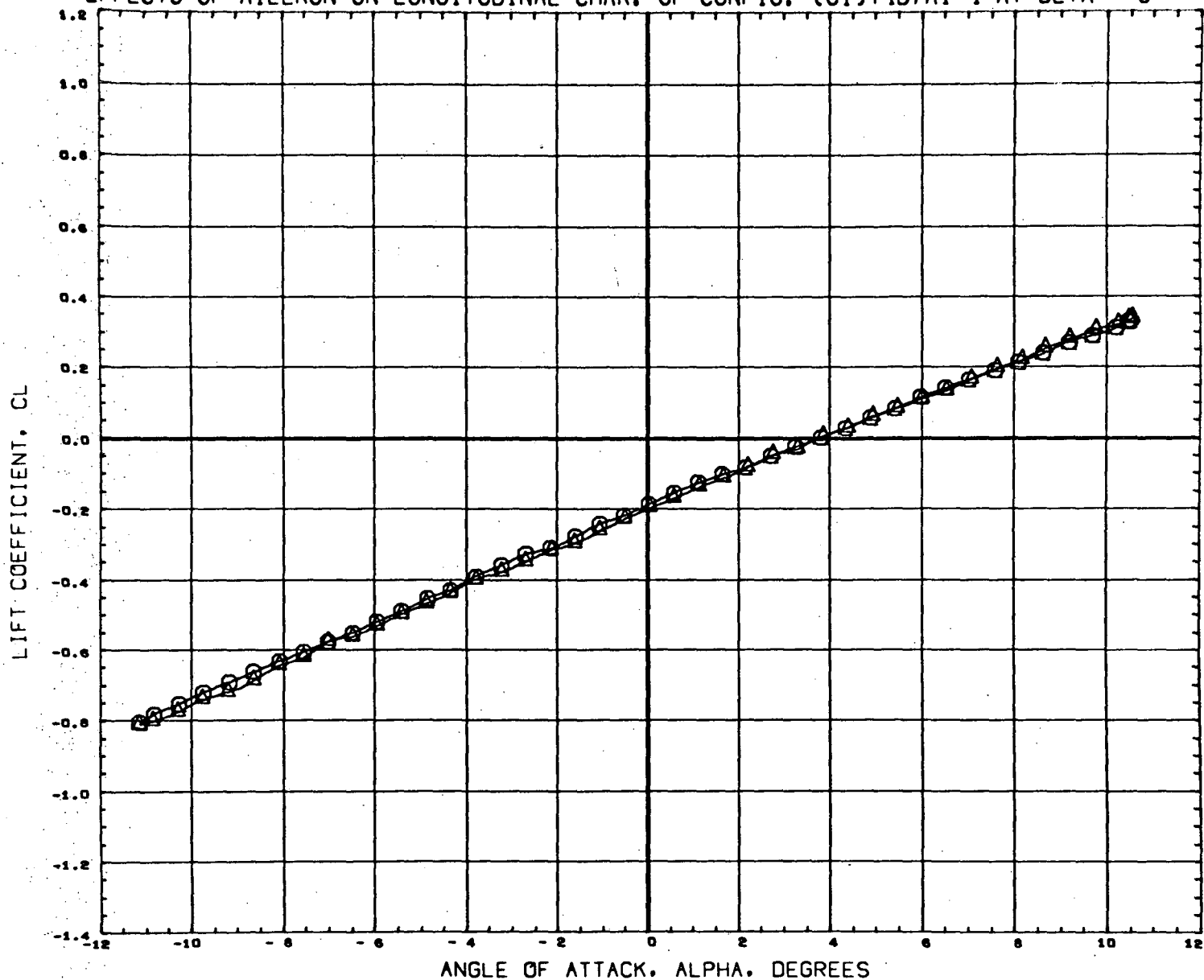
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| YMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0080 | SCALE |

MACH

.90

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

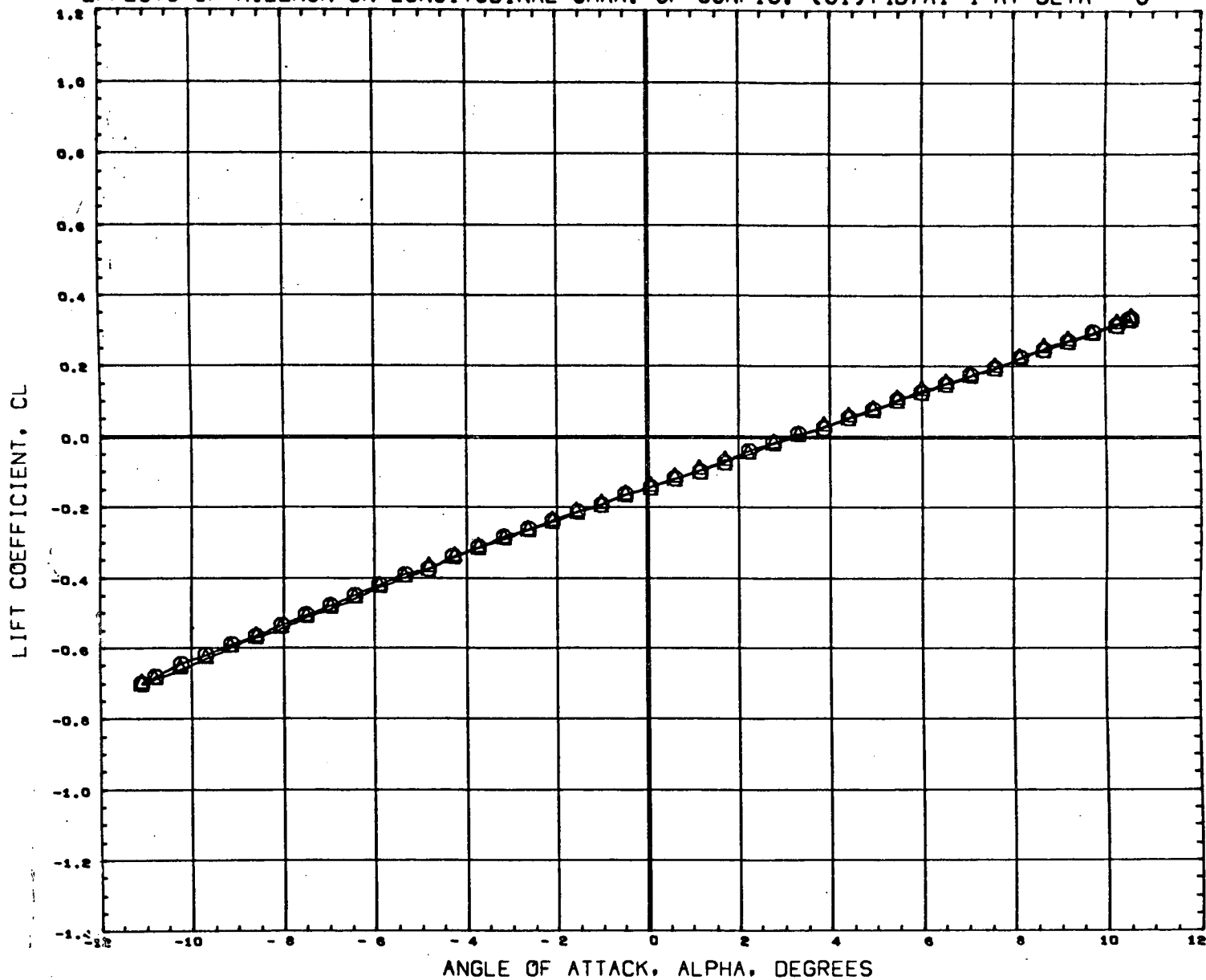


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D3) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.10

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



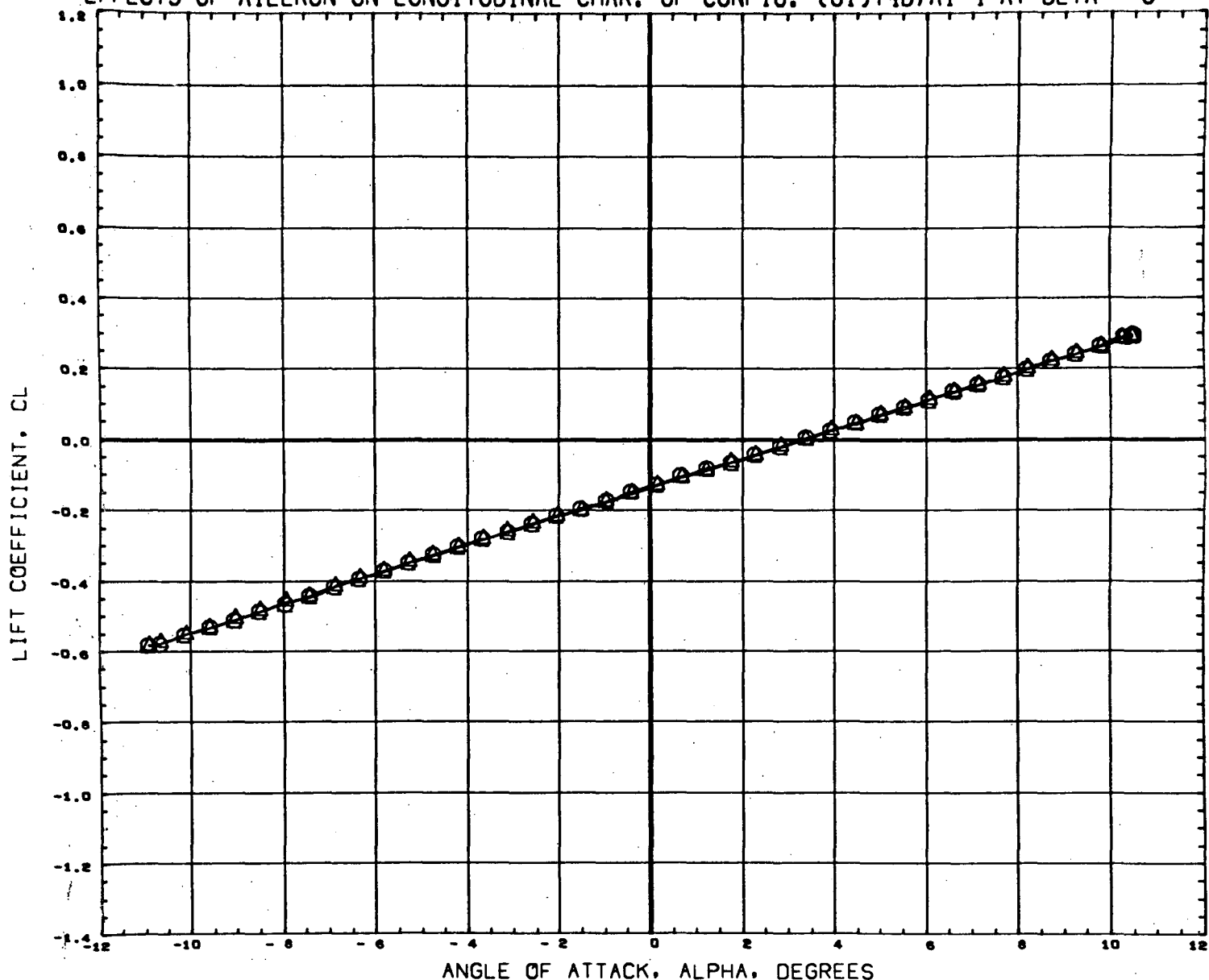
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (C074C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (C074D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 1.51

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



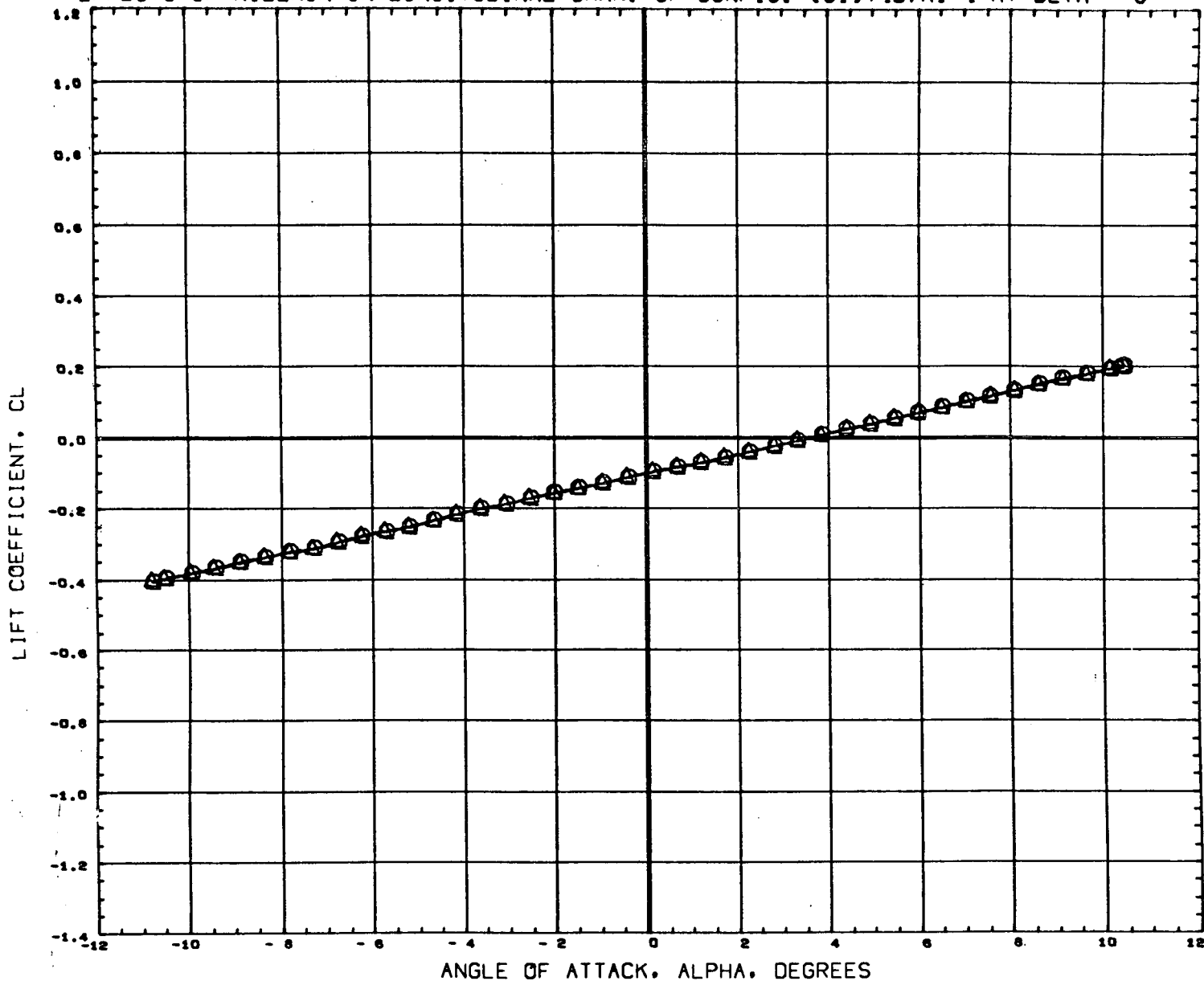
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (CD74D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 6.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 20.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 537.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH 2.20

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



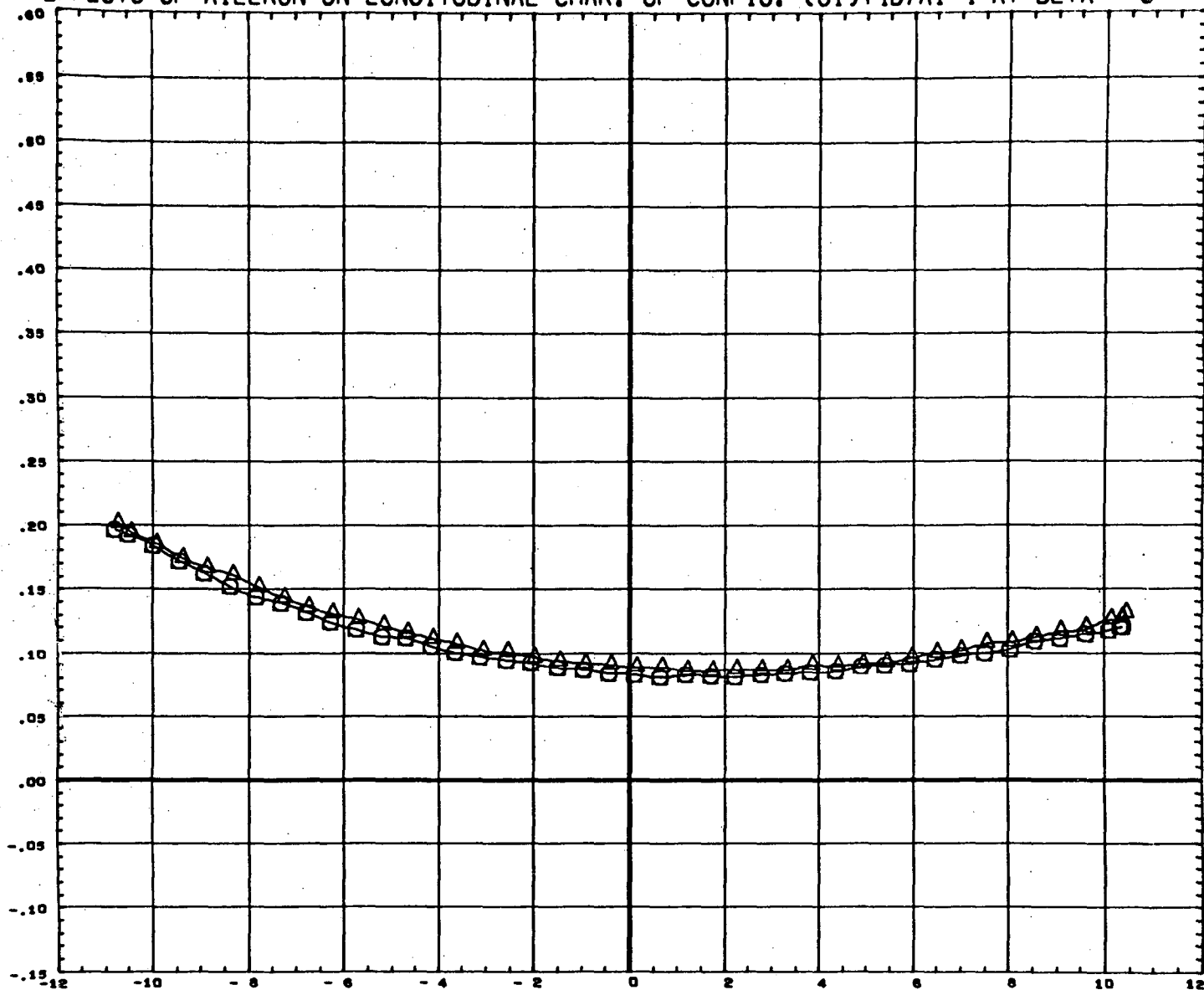
| DATA SET SYMBOL | | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-----------------|---|---|-------|--------|--------|--------|-----------------------|-----------|--------|
| (CD74C9) | ○ | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| (CD74D3) | △ | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | | | | BREF | 662.0004 | IN. |
| | | | | | | | YMRP | 557.0004 | IN. |
| | | | | | | | YMRP | 0.0000 | IN. |
| | | | | | | | ZMRP | 200.0004 | IN. |
| | | | | | | | SCALE | 0.0060 | SCALE |

MACH 4.47

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

FOREBODY DRAG COEFFICIENT, CDF



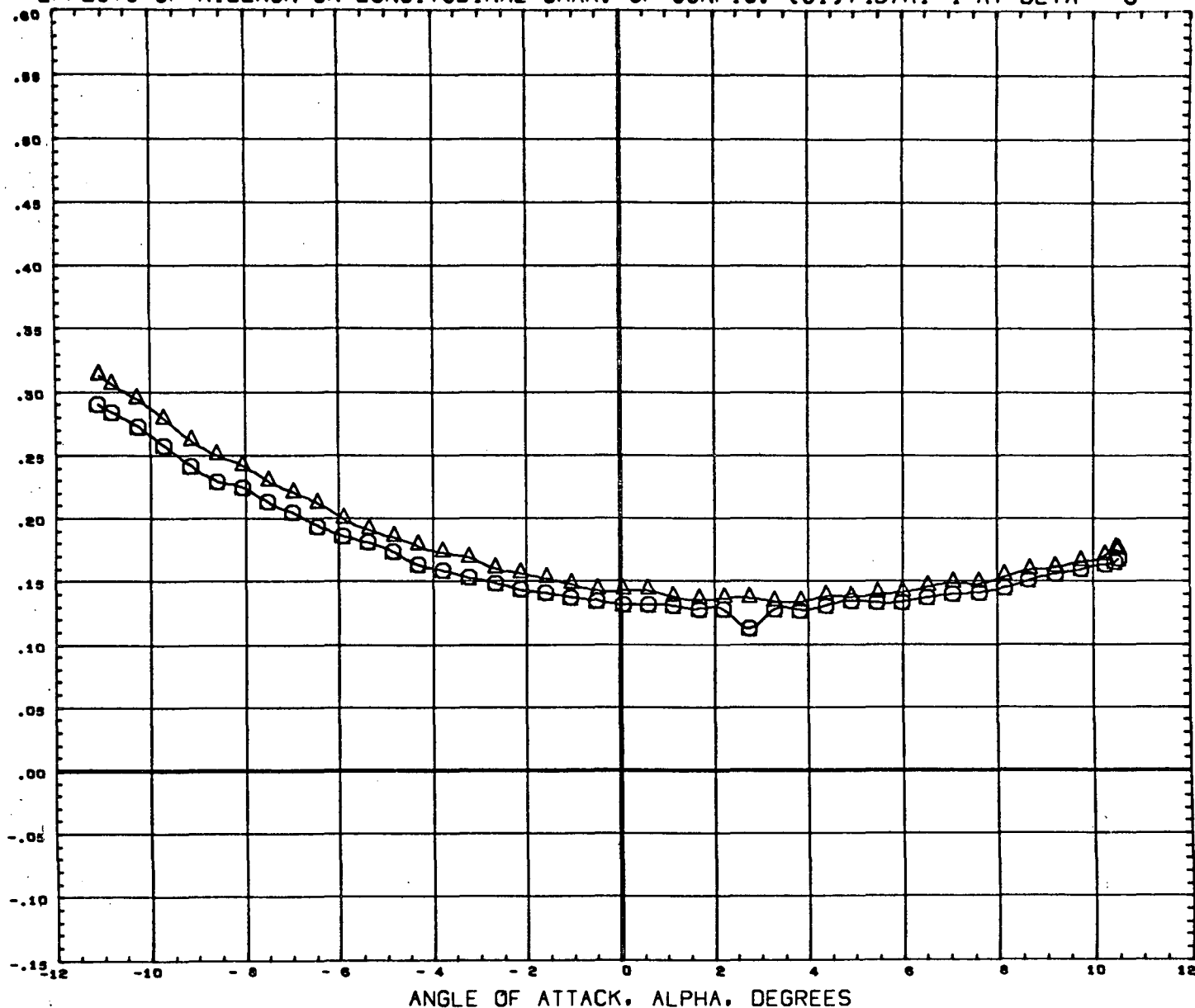
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-----------------|---|-------|--------|--------|--------|-----------------------|-----------|--------|
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| (CD74D3) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | | | BREF | 882.0004 | IN. |
| | | | | | | XMRP | 957.0004 | IN. |
| | | | | | | YMRP | 0.0000 | IN. |
| | | | | | | ZMRP | 200.0004 | IN. |
| | | | | | | SCALE | 0.0060 | SCALE |

MACH .58

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

FOREBODY DRAG COEFFICIENT, CDF



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C9) ○ MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74D3) △ MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

BETA ELEVTR AILERON RUDDER
 6.000 0.000 0.000 0.000
 6.000 0.000 20.000 0.000

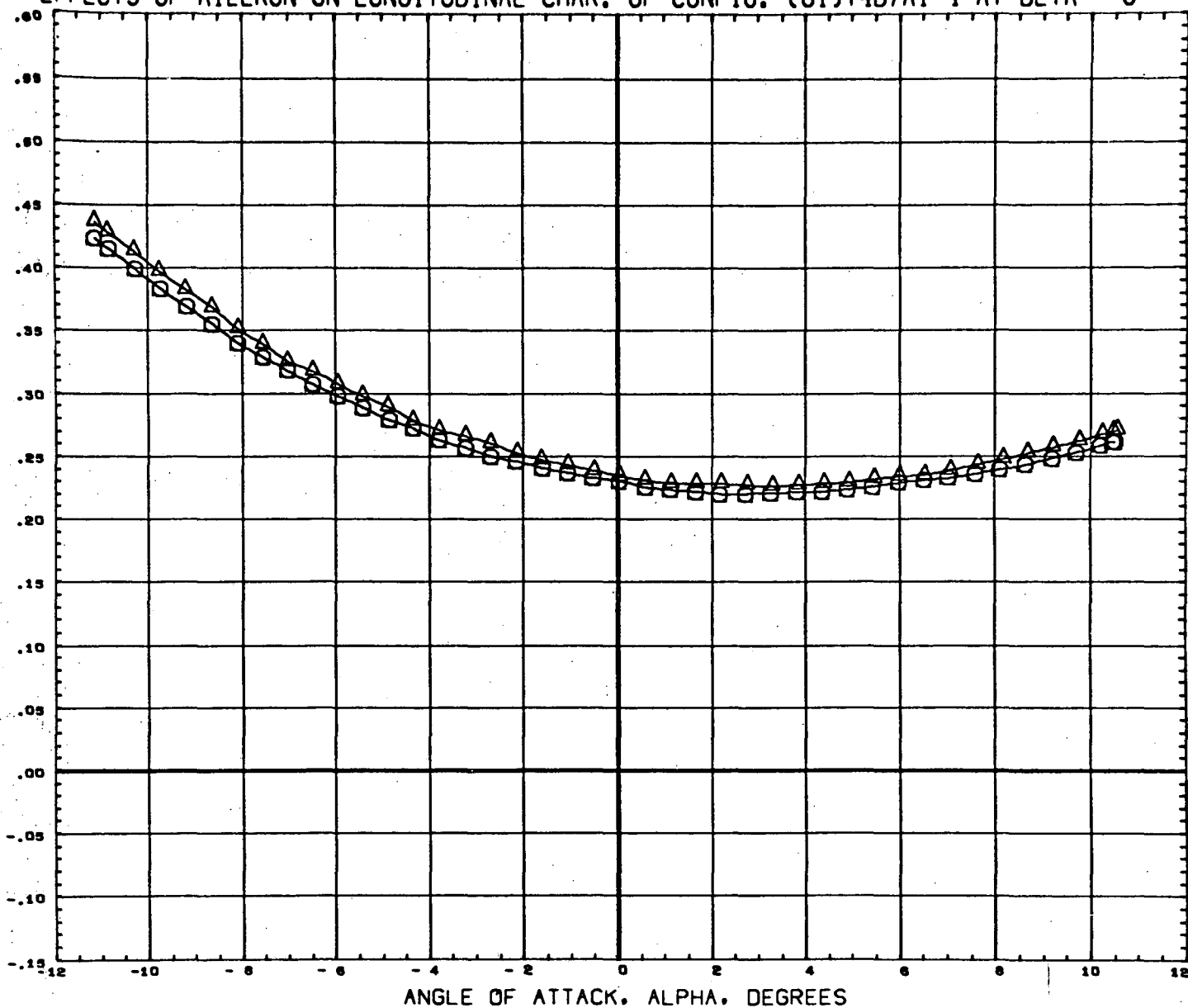
REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 662.0004 IN.
 XMRP 537.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH .90

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

FOREBODY DRAG COEFFICIENT, CDF



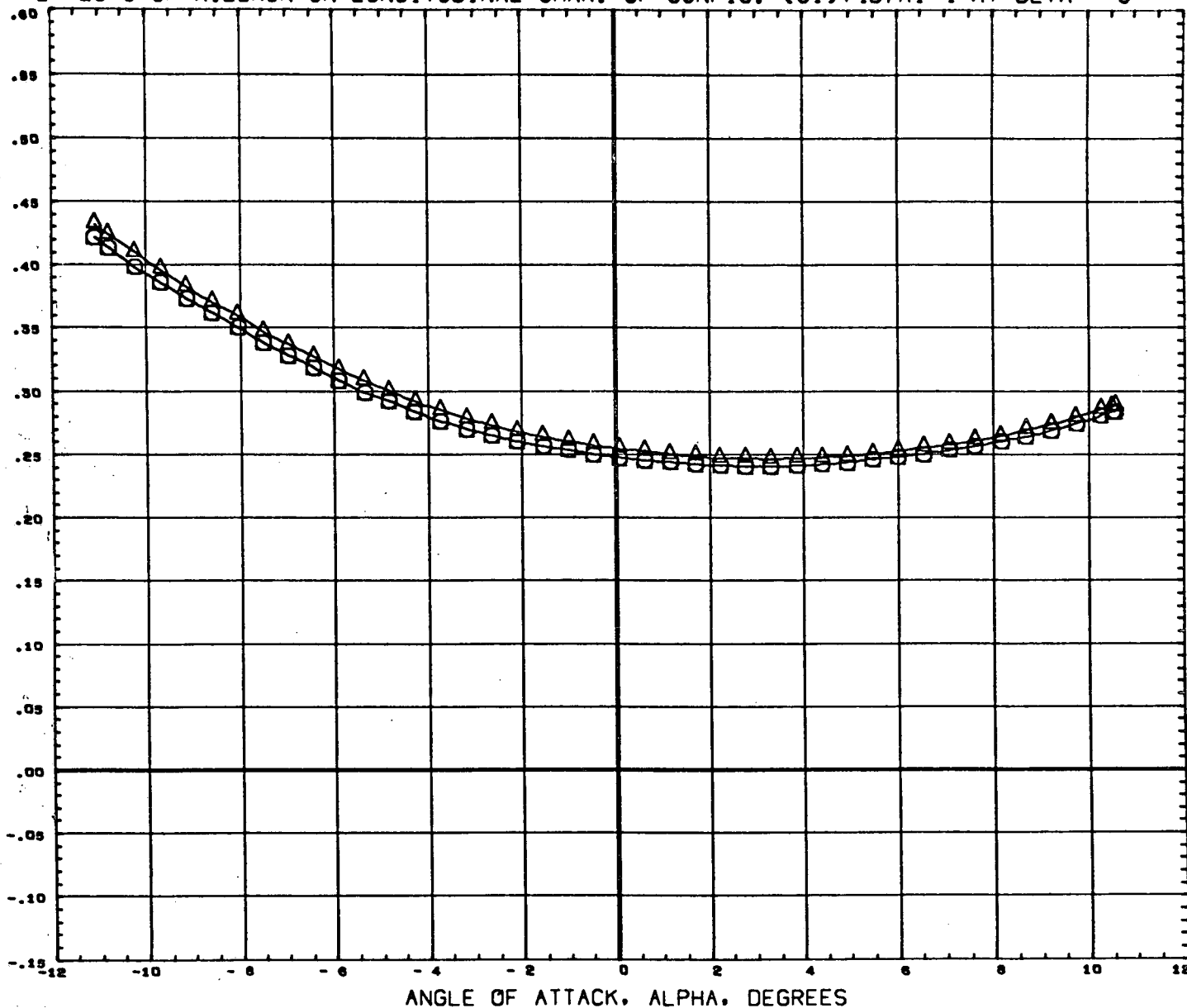
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D3) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 537.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.10

PAGE 191

EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

FOREBODY DRAG COEFFICIENT, CDF



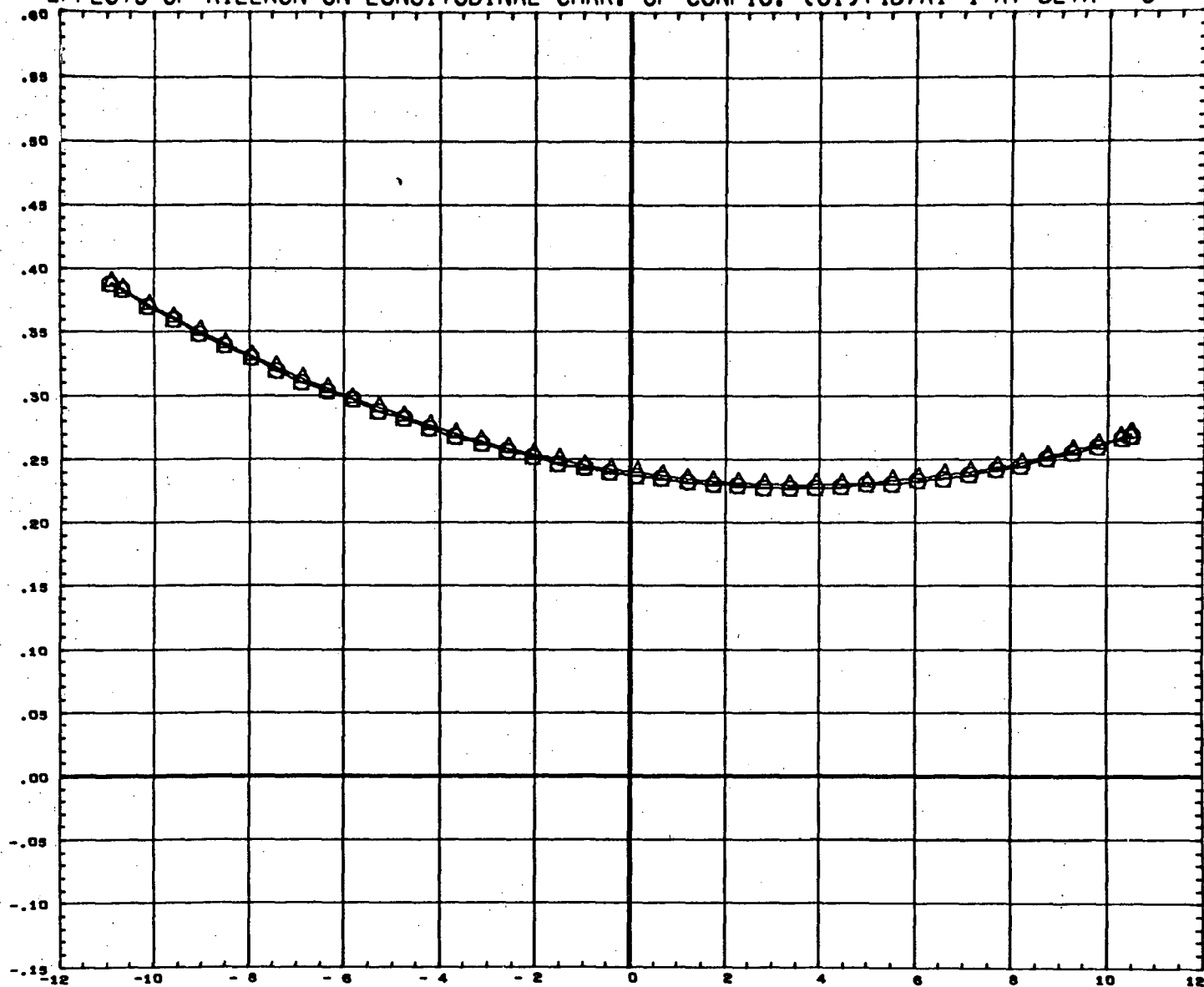
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D3) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRF | 557.0004 IN. |
| | | | | | | YMRF | 0.0000 IN. |
| | | | | | | ZMRF | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.51

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

FOREBODY DRAG COEFFICIENT, CDF



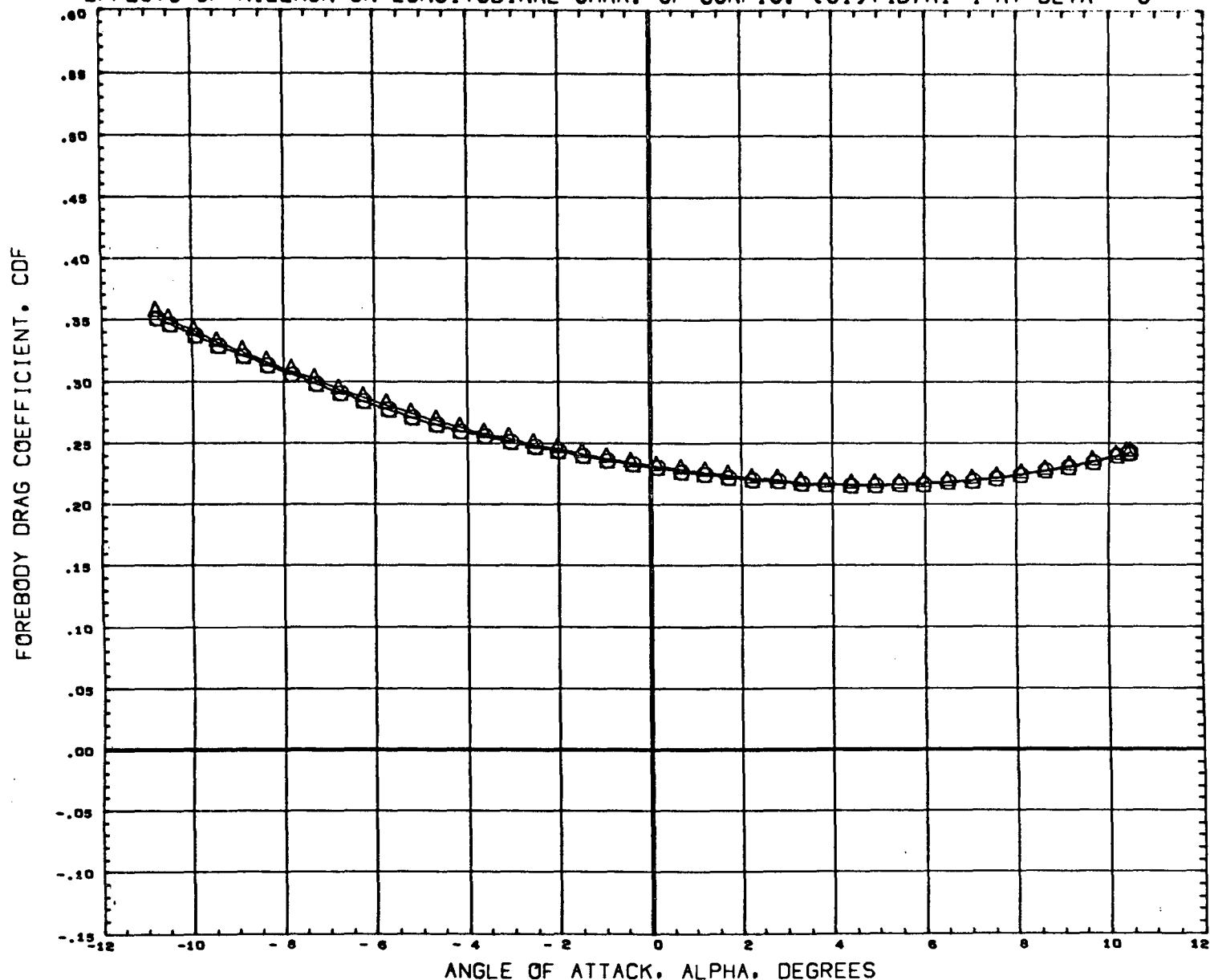
ANGLE OF ATTACK, ALPHA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D3) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.3004 IN. |
| | | | | | | BREF | 682.0004 IN. |
| | | | | | | XMRP | 537.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

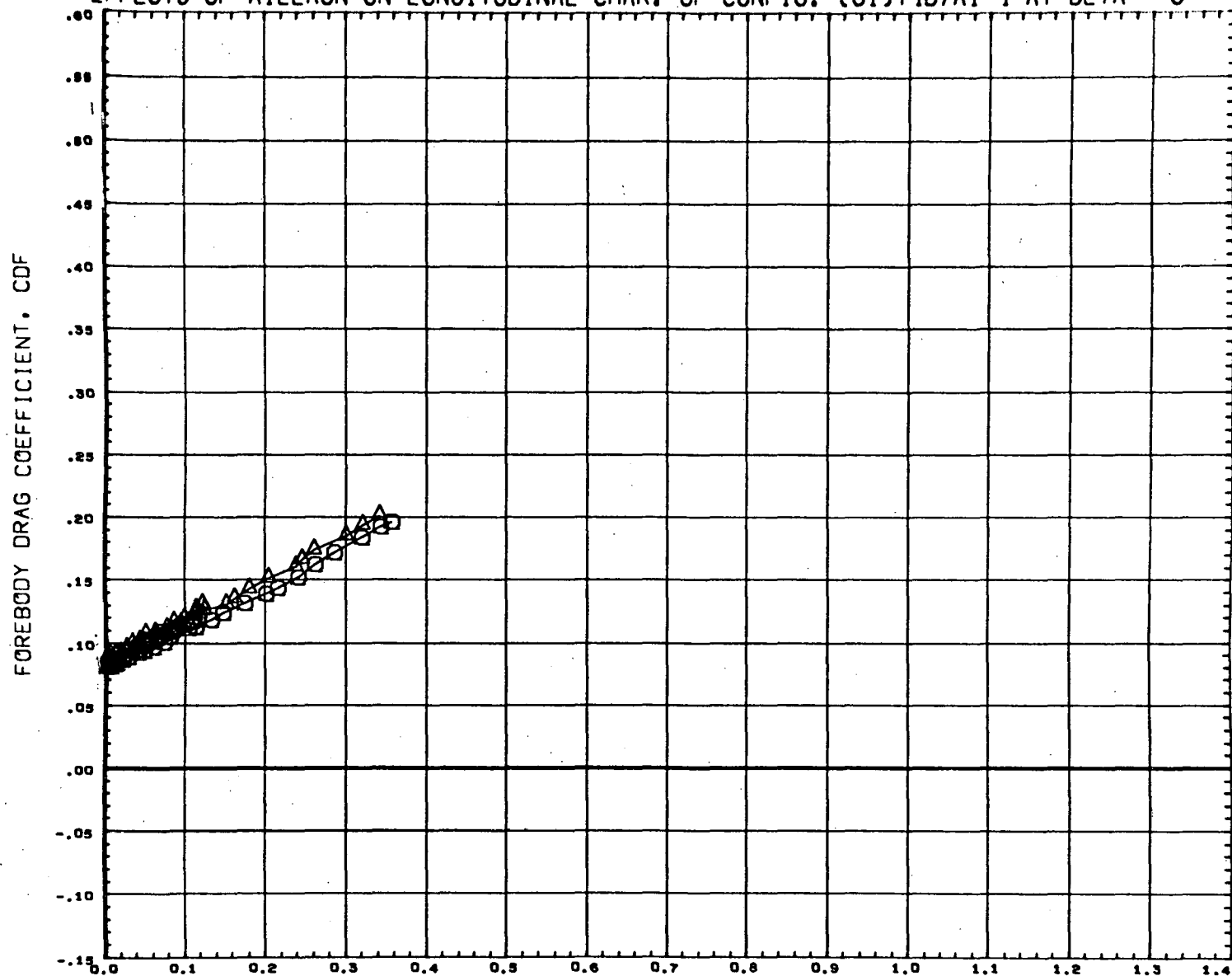


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



LIFT COEFFICIENT SQUARED, CLSQR

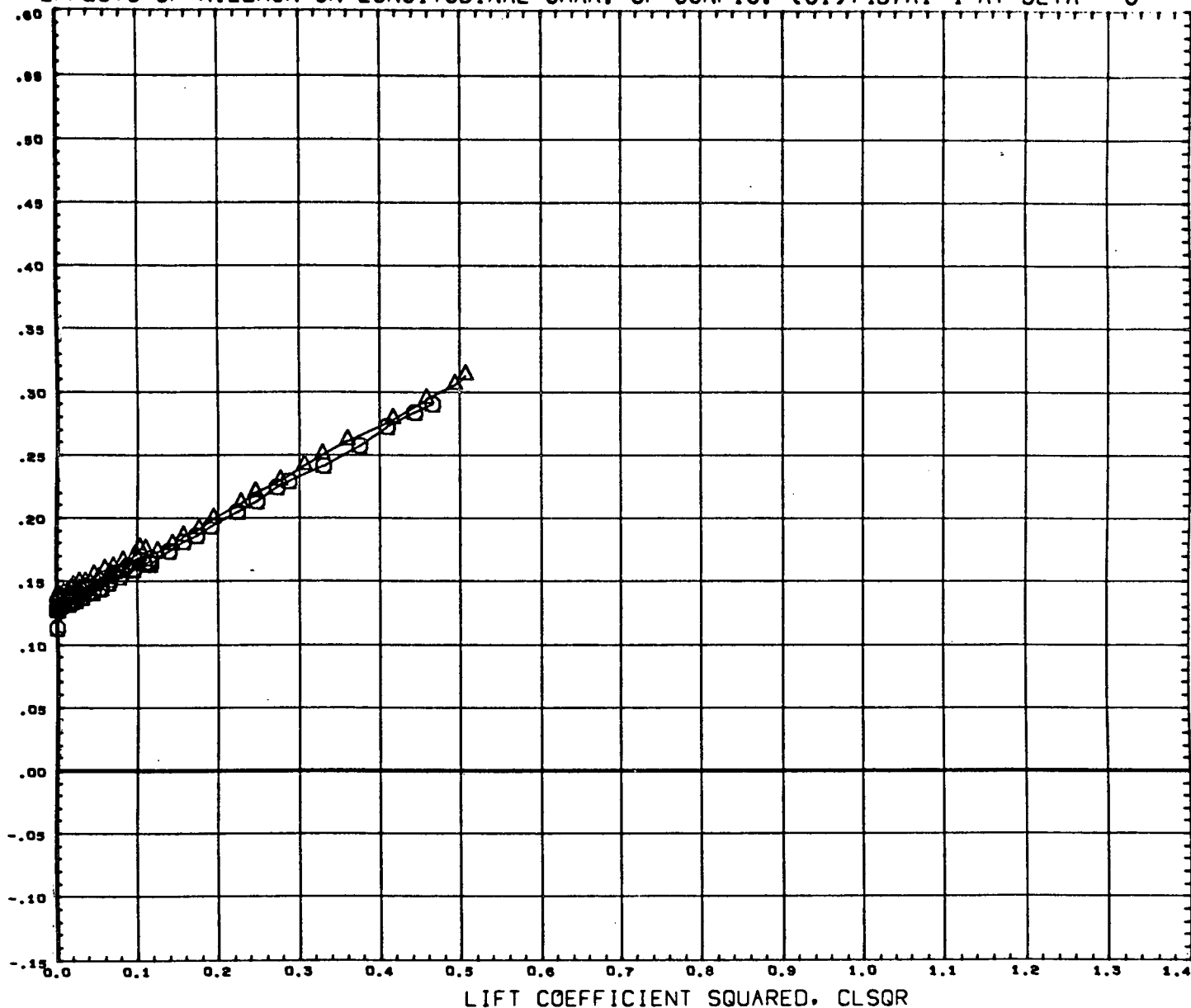
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D3) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

FOREBODY DRAG COEFFICIENT, CDF



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C9) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
 (CD74D3) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

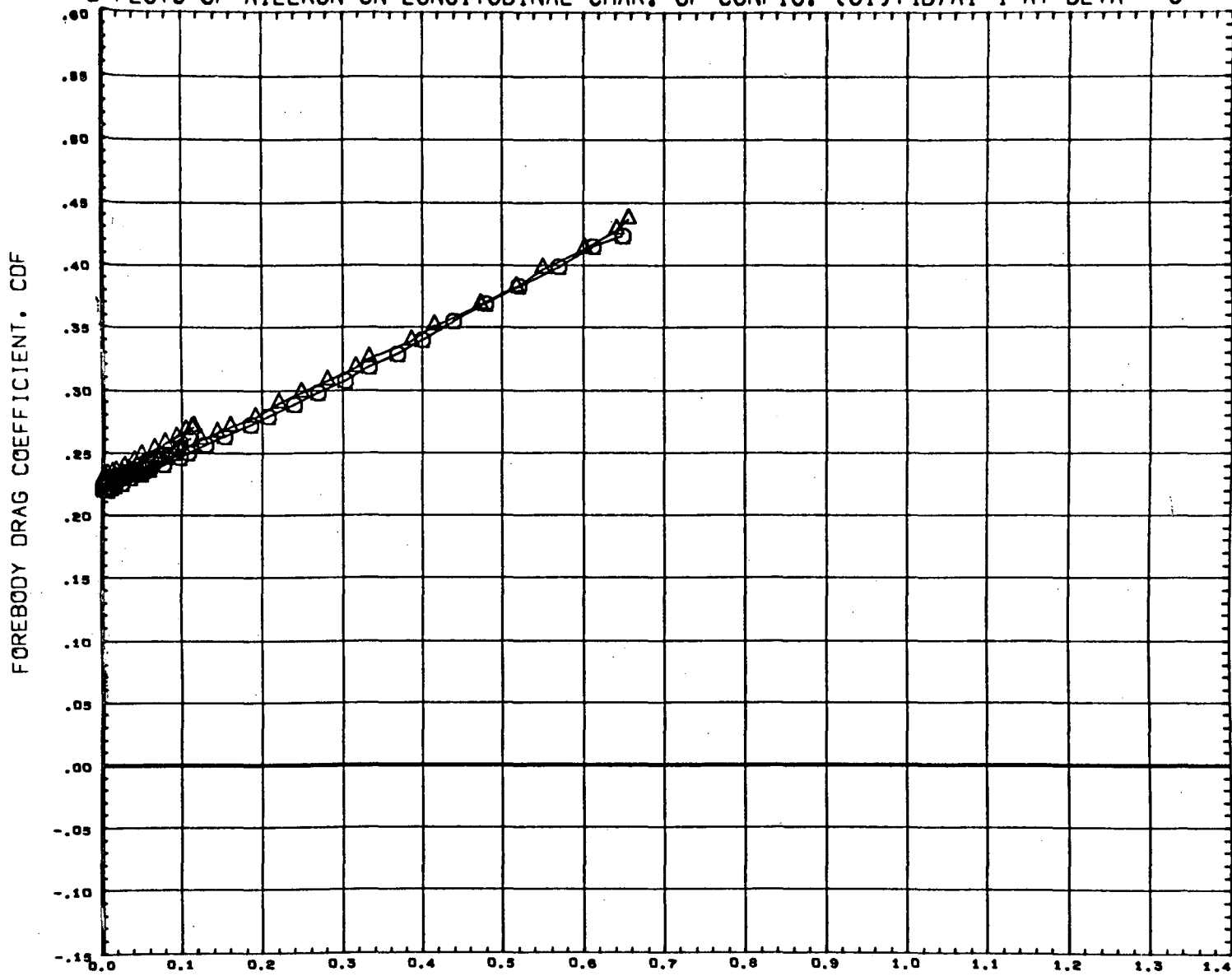
BETA ELEVTR AILRON RUDDER
 6.000 0.000 0.000 0.000
 6.000 0.000 20.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH .90

PAGE 196

EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

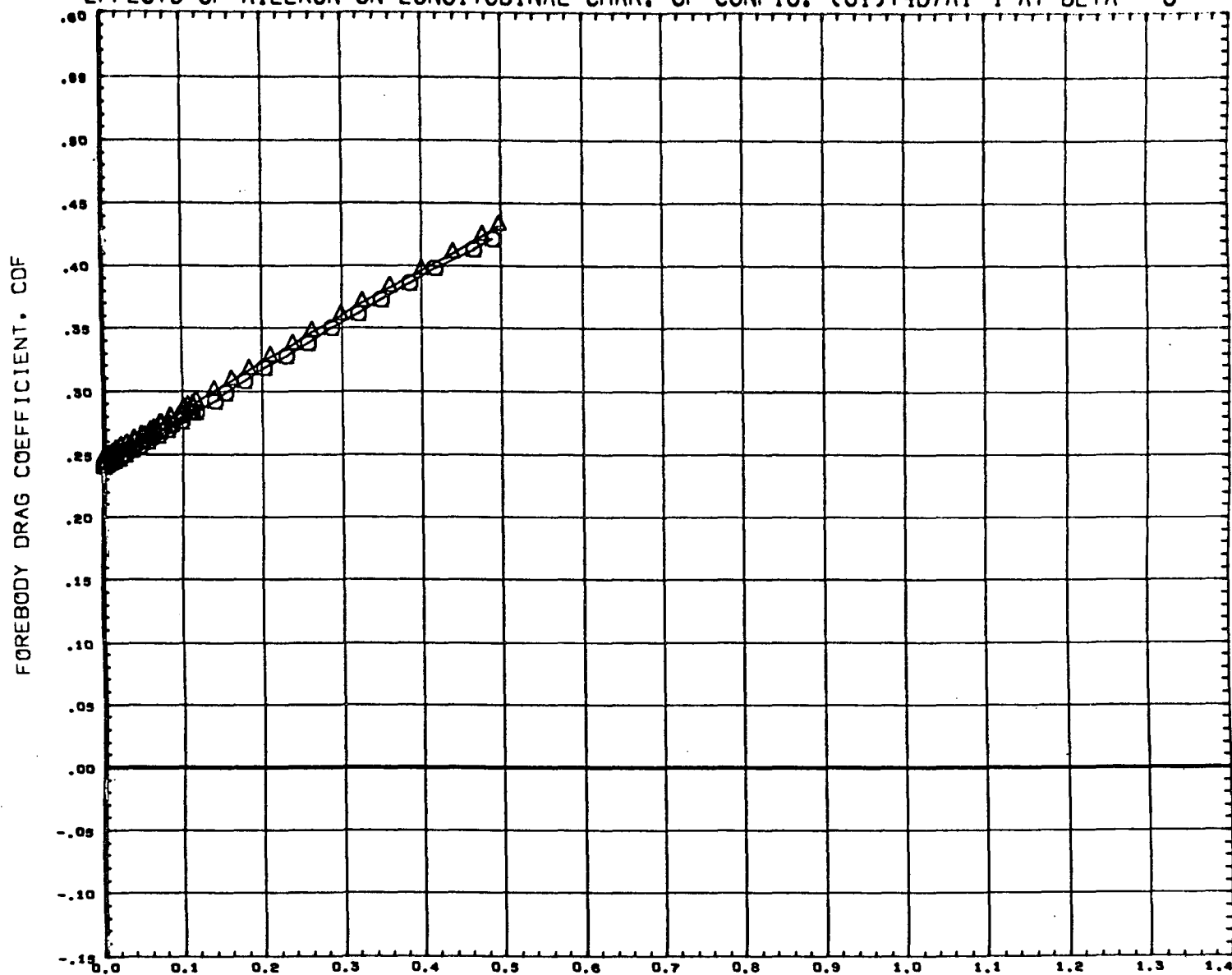


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.10



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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



LIFT COEFFICIENT SQUARED, CLSQR

DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C9)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
(CD74D3)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 6.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 20.000 | 0.000 |

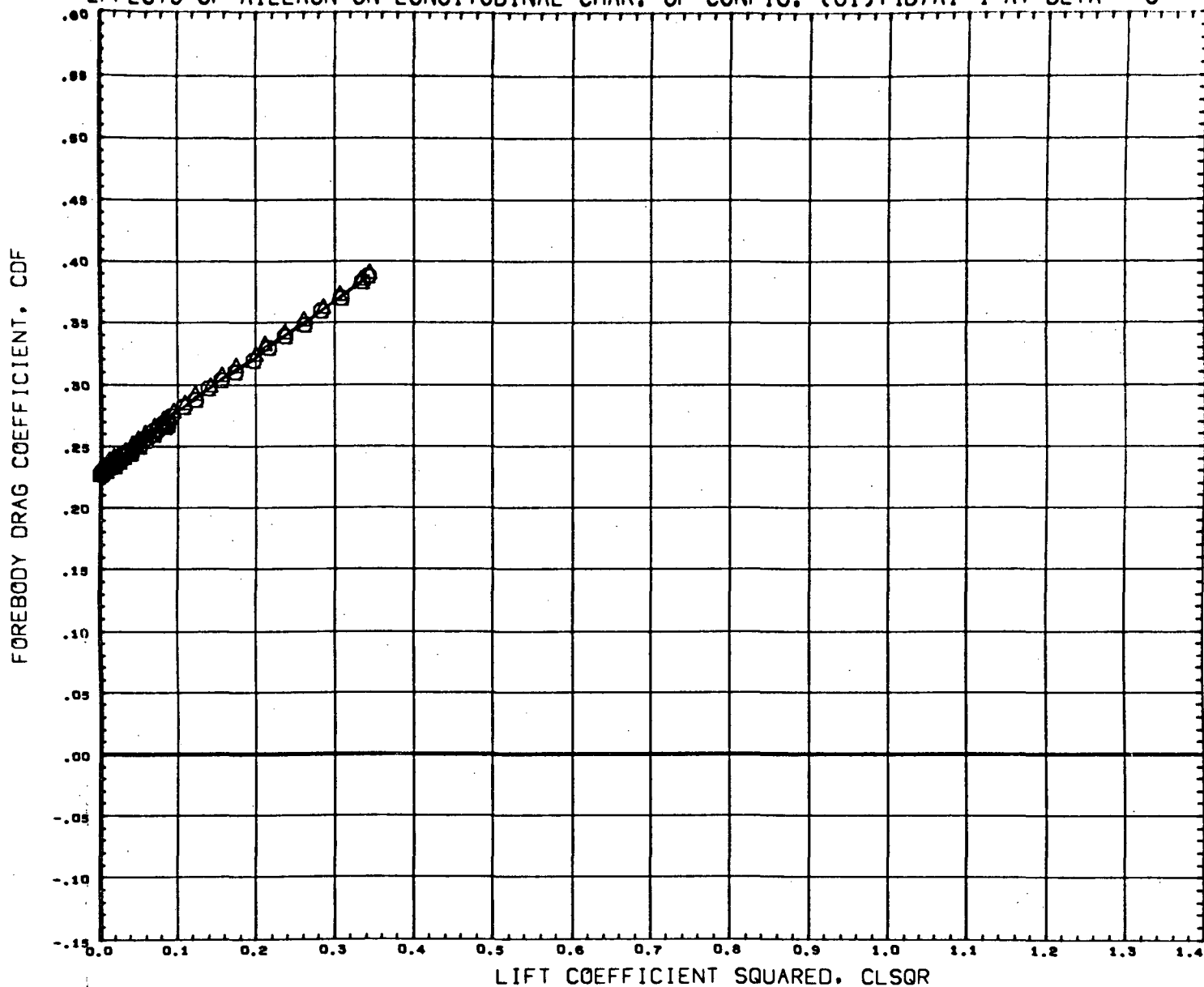
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH

1.51

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



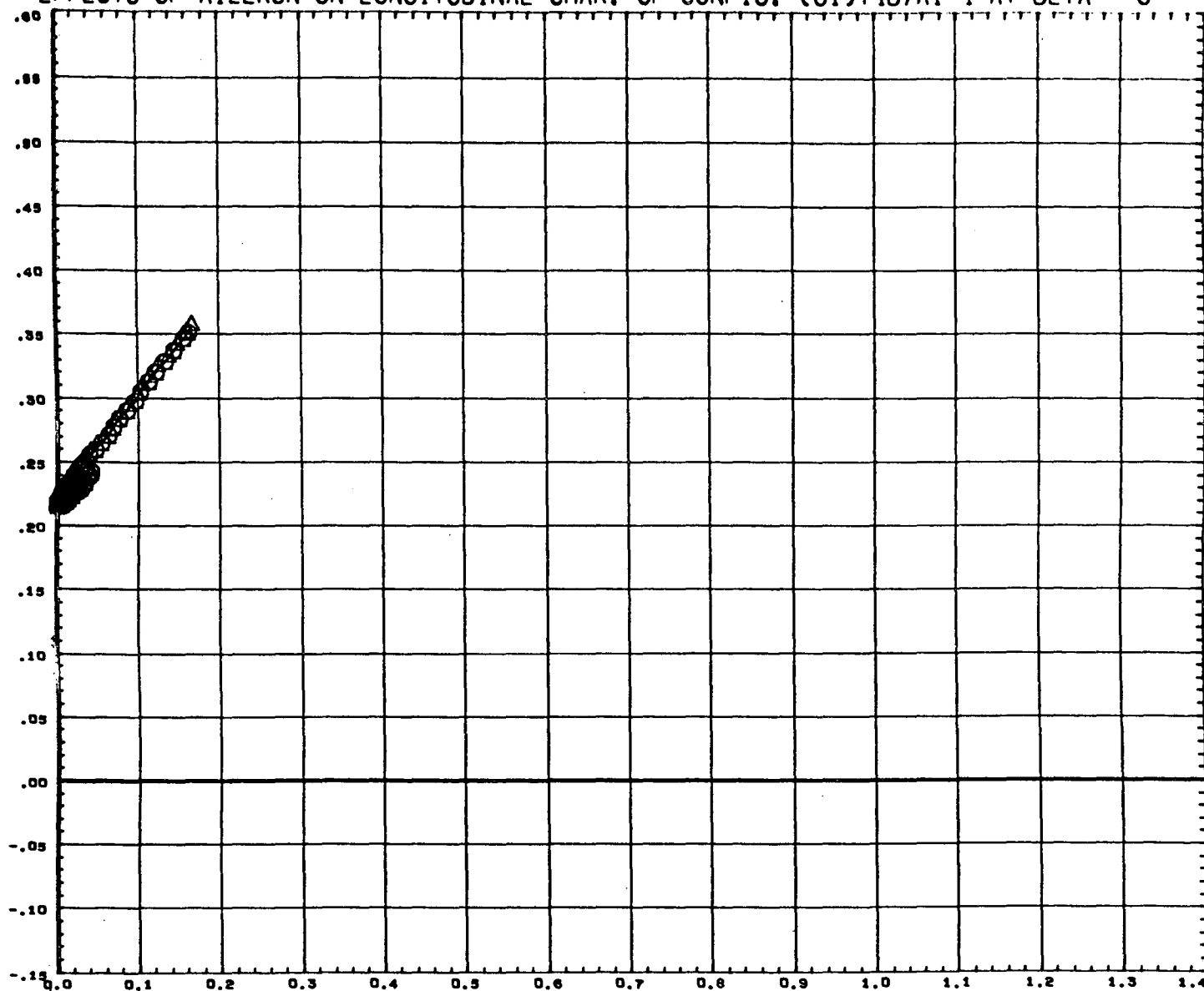
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

FOREBODY DRAG COEFFICIENT, CDF



LIFT COEFFICIENT SQUARED, CLSQ

DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C9) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
(CD74D3) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 6.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 20.000 | 0.000 |

REFERENCE INFORMATION

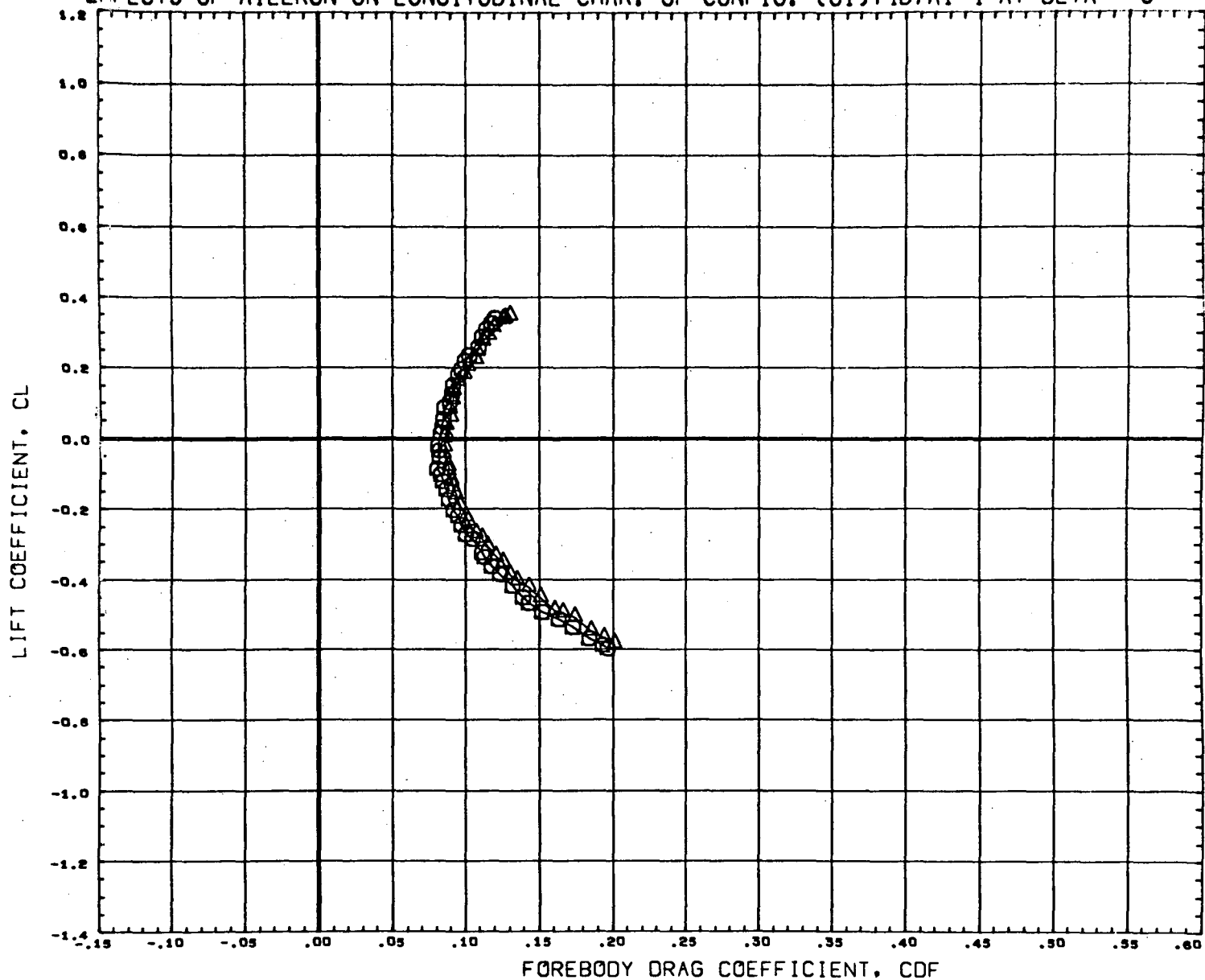
| | | |
|-------|-----------|---------|
| SREF | 3155.3040 | SQ. FT. |
| LREF | 609.3004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH

4.47

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



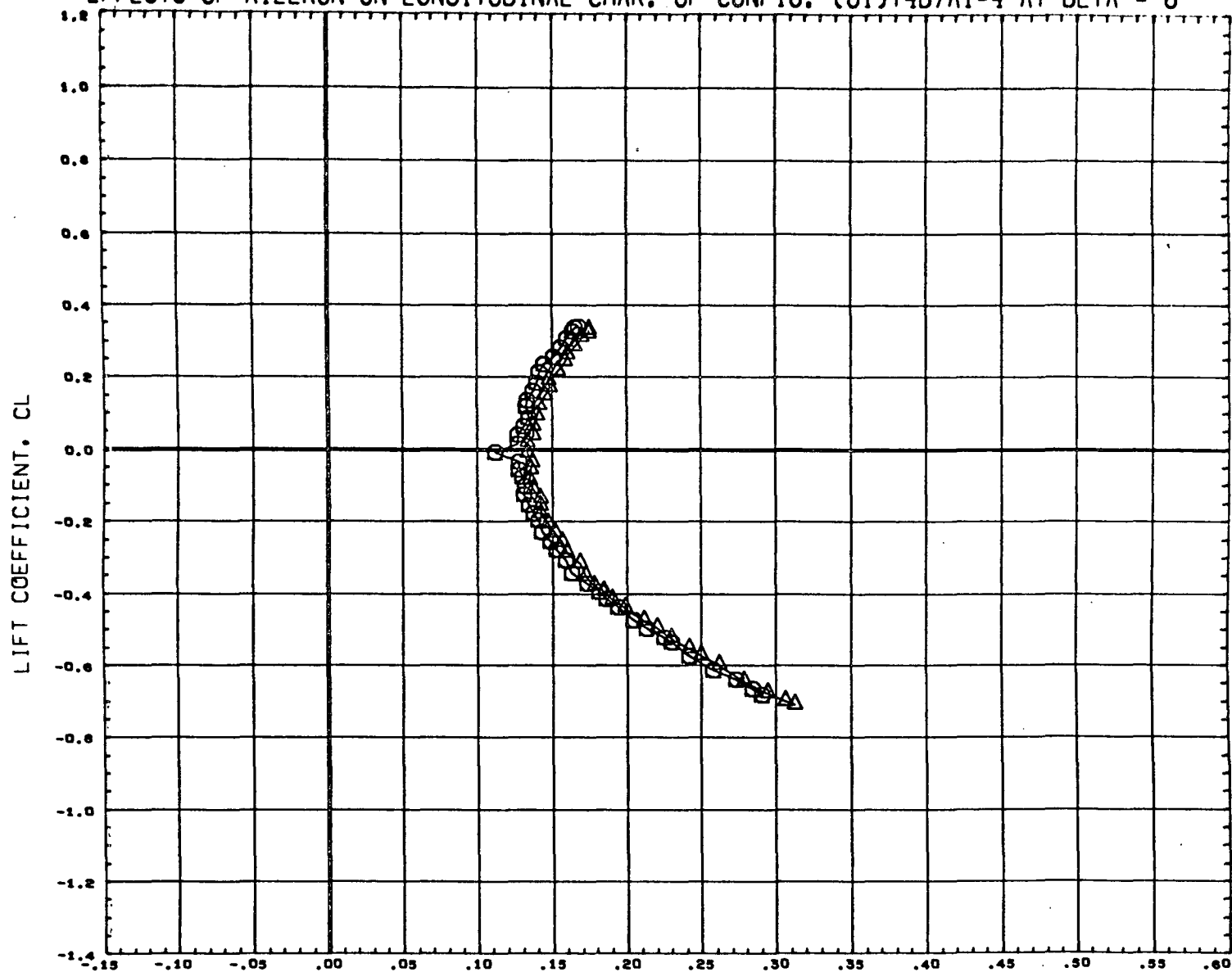
| DATA SET | SYMBOL | CONFIGURATION DESCRIPTION |
|----------|--------|---|
| (CD74C9) | ○ | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (CD74D3) | △ | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 357.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |



MACH .58

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C9)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
(CD74D3)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

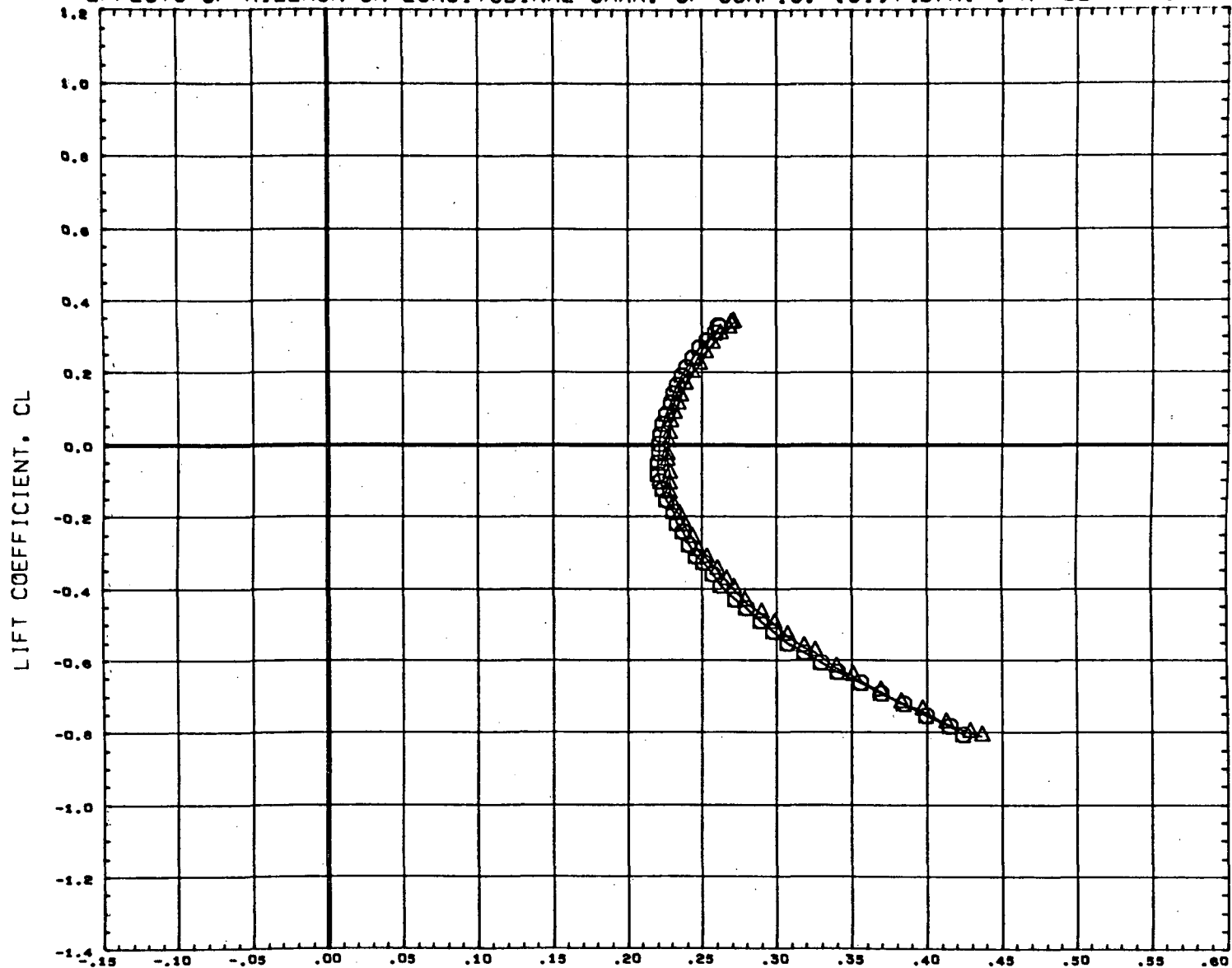
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 6.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 20.000 | 0.000 |

| REFERENCE INFORMATION | |
|-----------------------|------------------|
| SREF | 3155.3040 SQ.FT. |
| LREF | 609.5004 IN. |
| BREF | 862.0004 IN. |
| XMRP | 557.0004 IN. |
| YMRP | 0.0000 IN. |
| ZMRP | 200.0004 IN. |
| SCALE | 0.0060 SCALE |

MACH .90

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

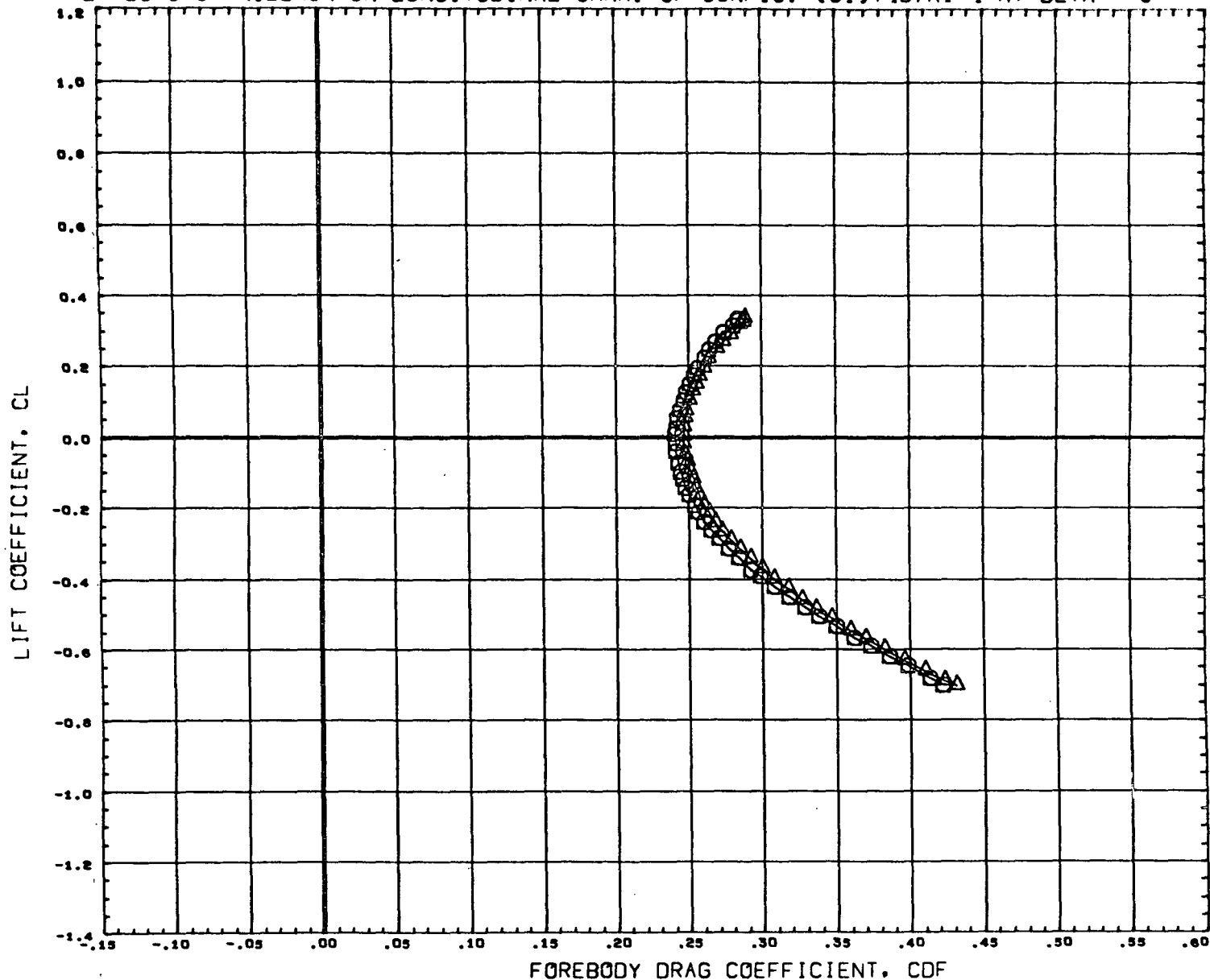


| | | FOREBODY DRAG COEFFICIENT, CDF | | | | | | | REFERENCE INFORMATION | |
|-----------------|--|--------------------------------|--------|--------|--------|-------|-----------|--------|-----------------------|--|
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | SREF | 3155.3040 | SQ.FT. | | |
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 | IN. | | |
| (CD74D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | BREF | 882.0004 | IN. | | |
| | | | | | | XMRP | 557.0004 | IN. | | |
| | | | | | | YMRP | 0.0000 | IN. | | |
| | | | | | | ZMRP | 200.0004 | IN. | | |
| | | | | | | SCALE | 0.0060 | SCALE | | |

MACH 1.10

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (CD74D3) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |

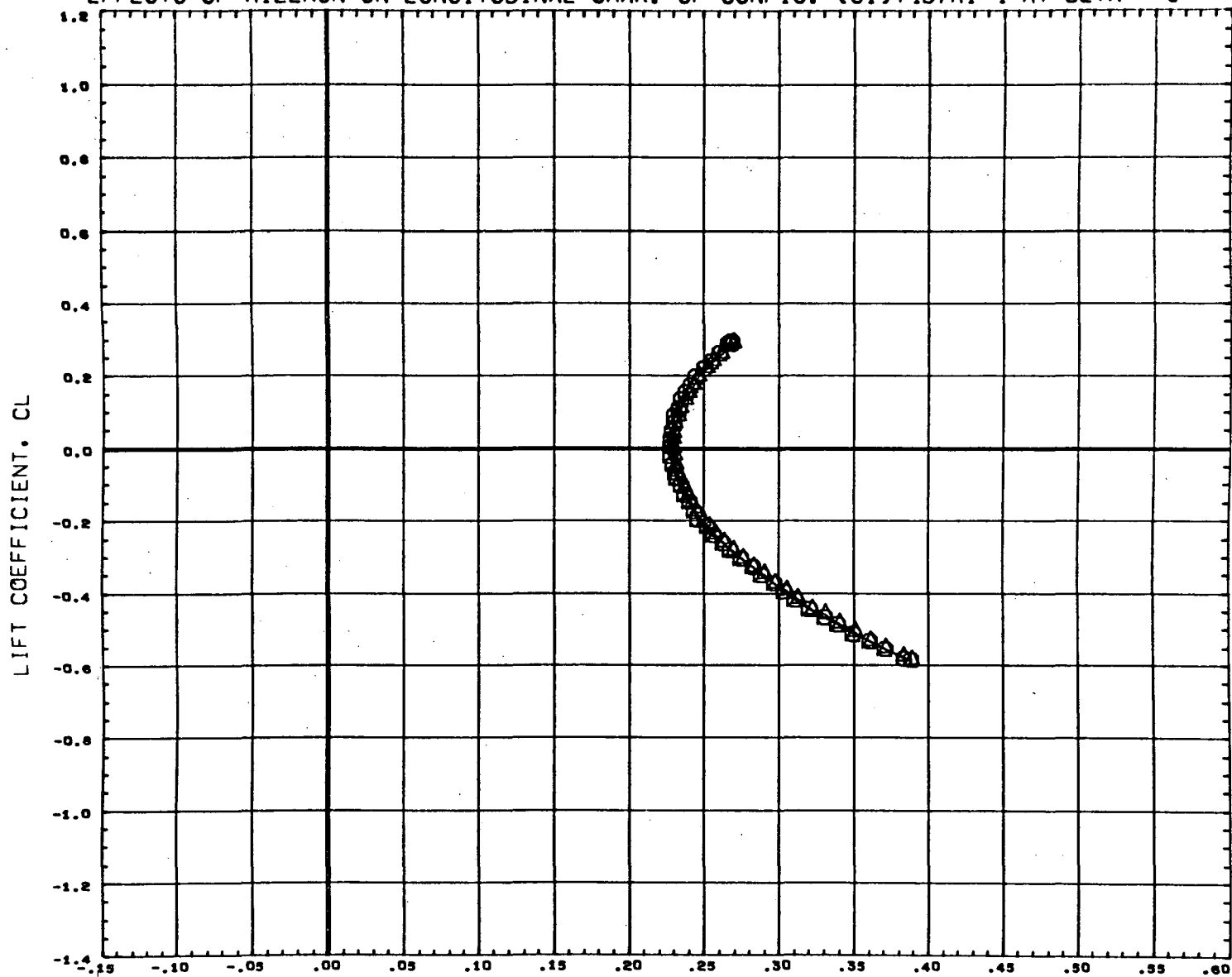
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 6.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 20.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 937.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 1.51

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



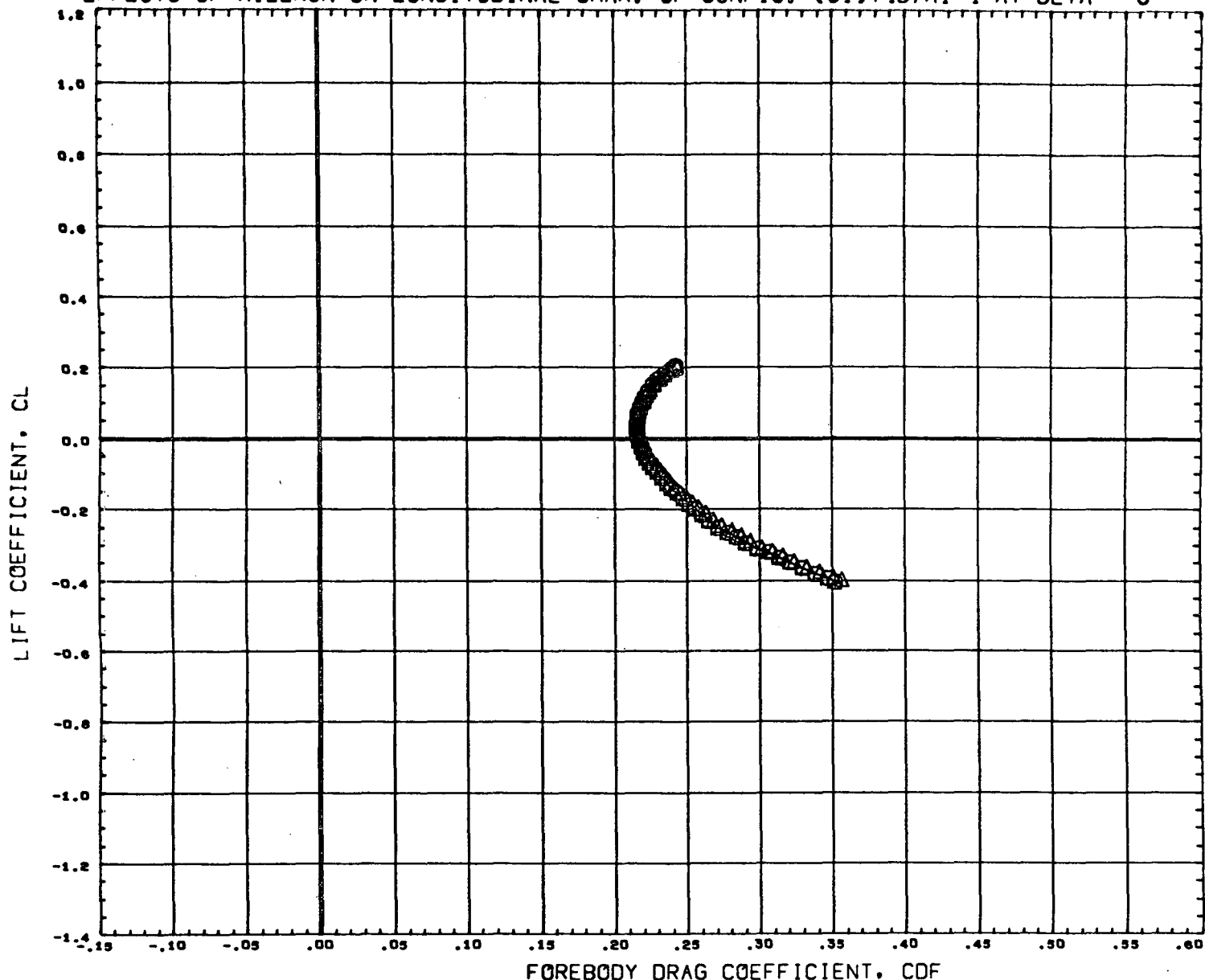
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (CD74D3) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-------|--------|--------|--------|-----------------------|-----------|--------|
| 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | BREF | 882.0004 | IN. |
| | | | | XMRF | 557.0004 | IN. |
| | | | | YMRF | 0.0000 | IN. |
| | | | | ZMRF | 200.0004 | IN. |
| | | | | SCALE | 0.0060 | SCALE |

MACH 2.20

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (CD74D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |

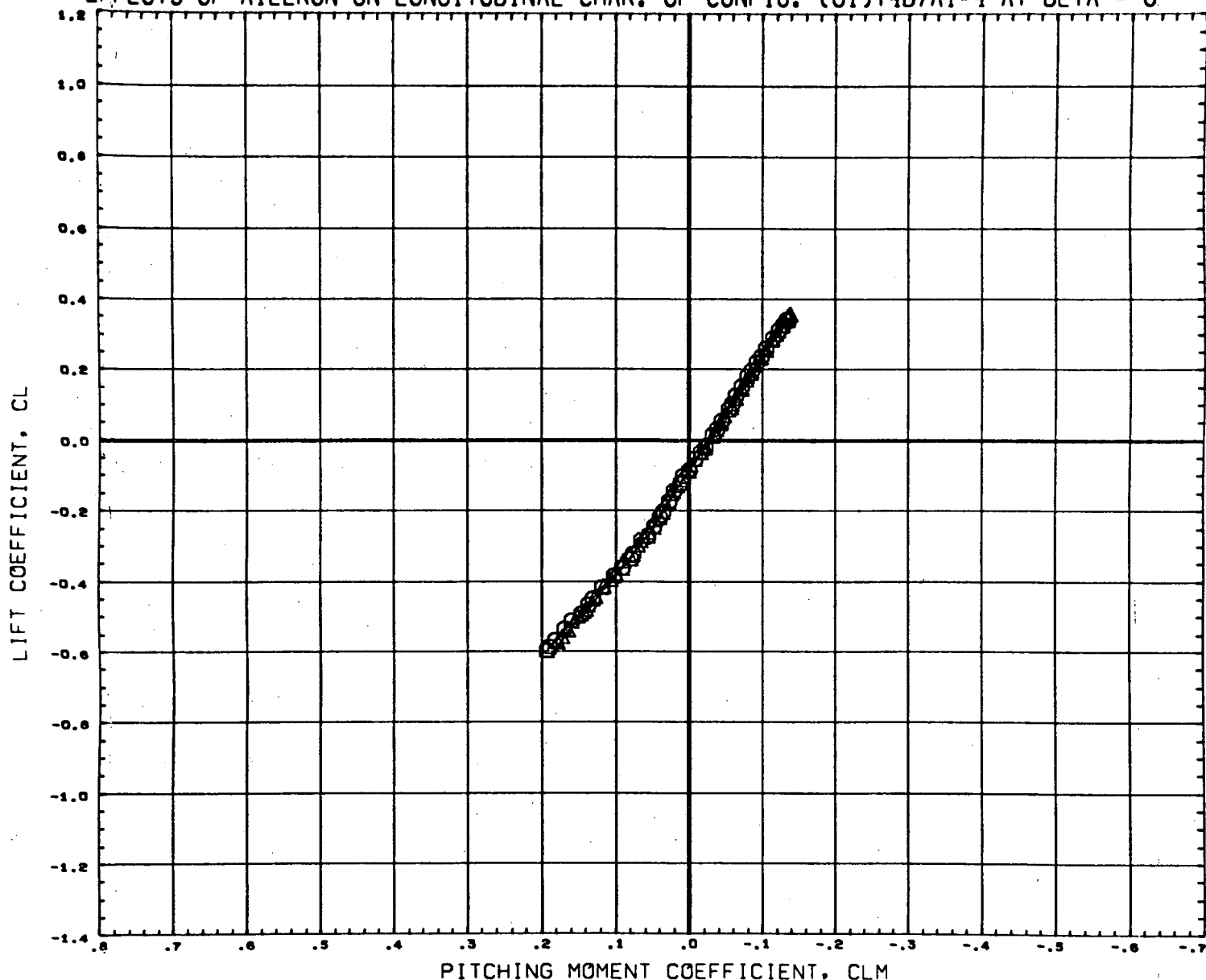
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 6.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 20.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 4.47

PAGE 206

EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

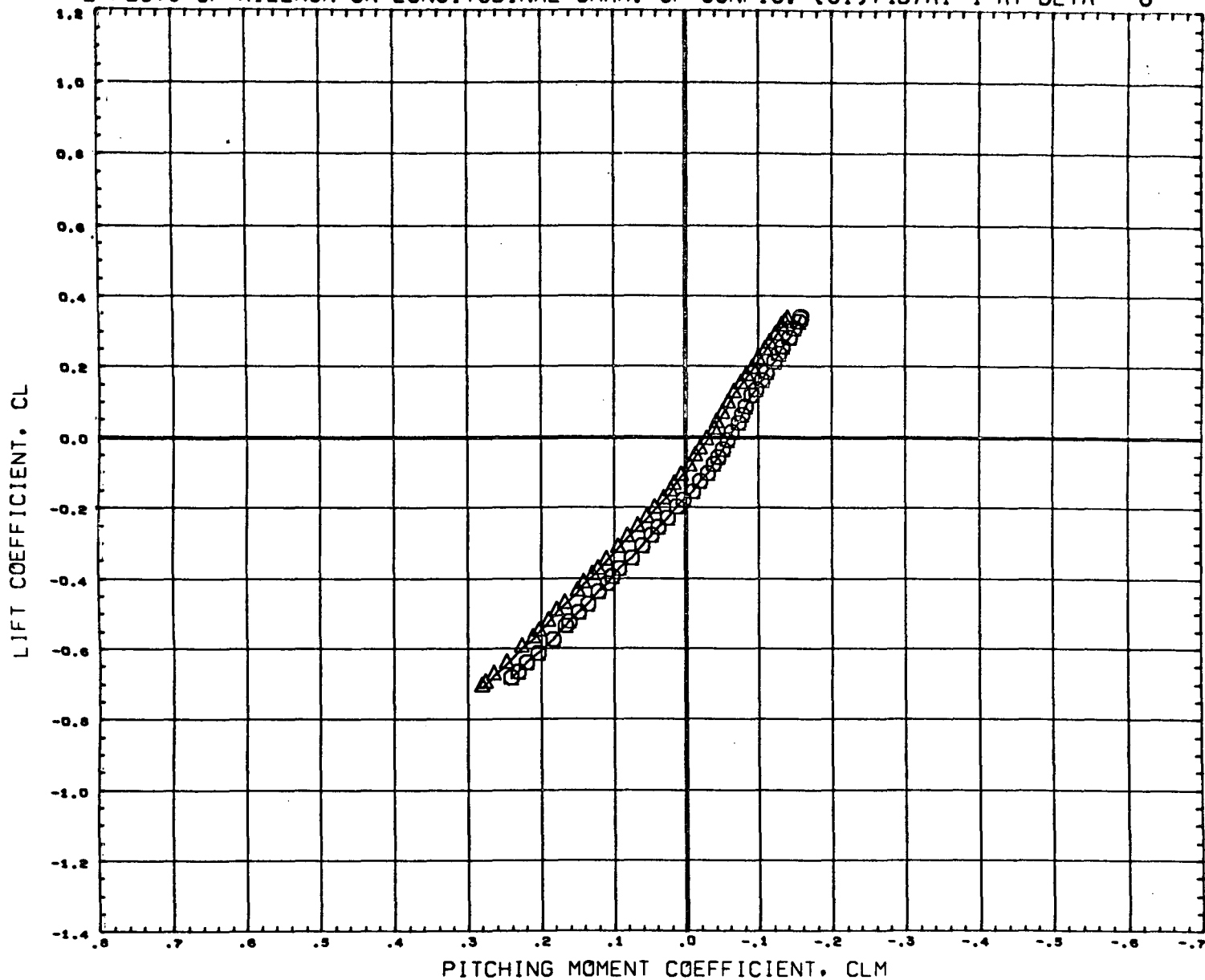


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D3) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |



MACH .58

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C9)  MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4
(CD74D3)  MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4

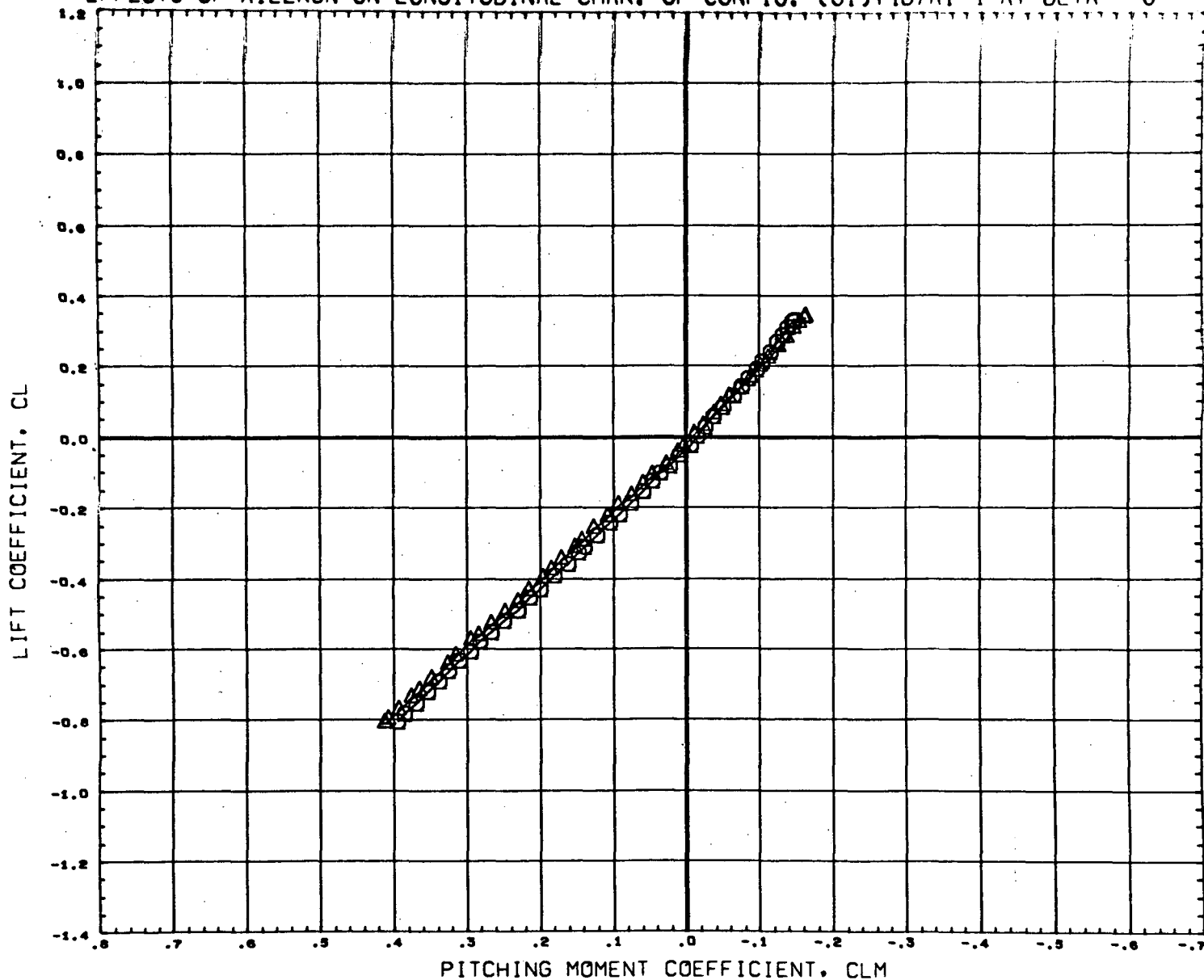
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 6.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 20.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH .90

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C9) Q MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

(CD74D3) A MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 6.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 20.000 | 0.000 |

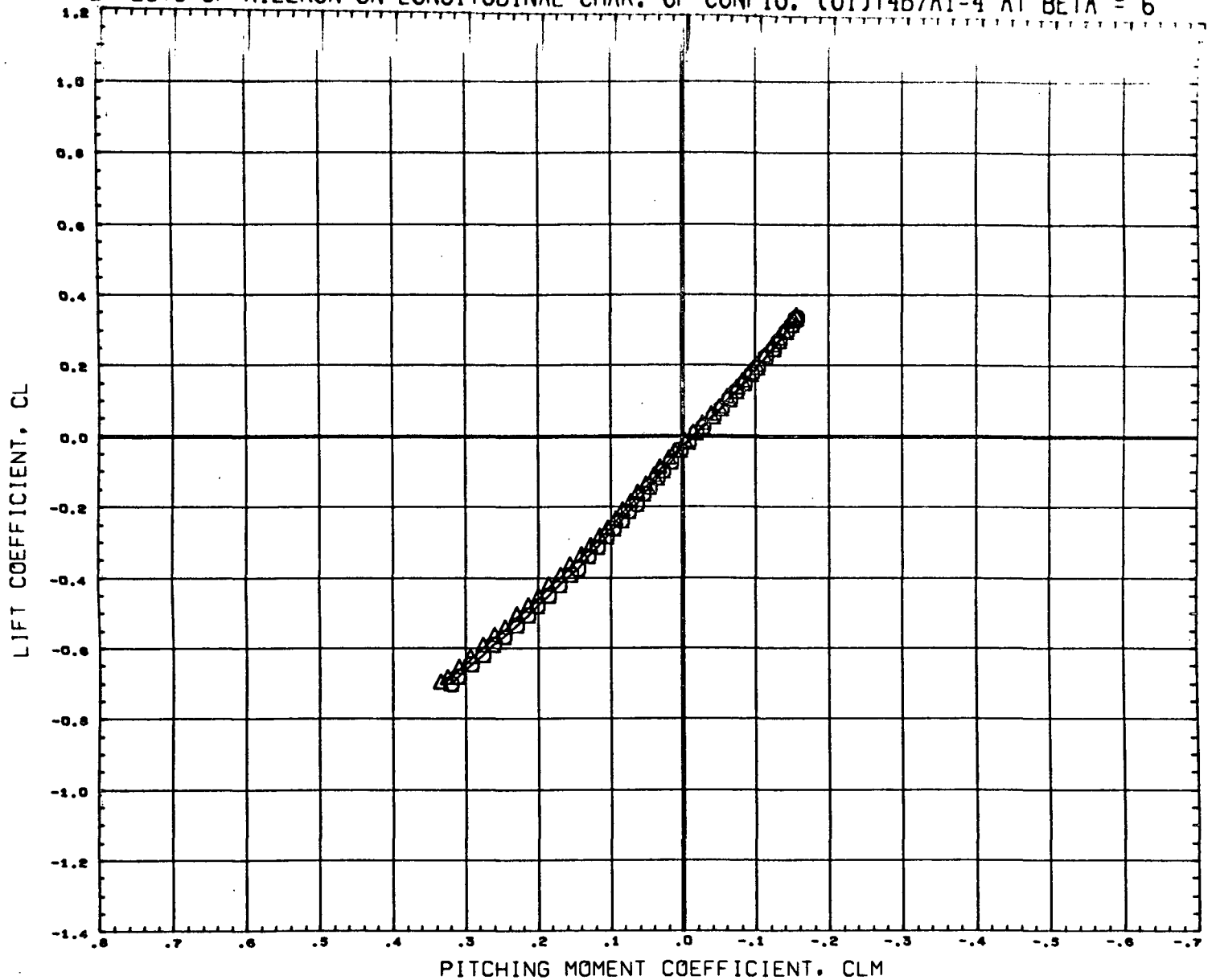
REFERENCE INFORMATION

| | | |
|-------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 1.10

PAGE 209

EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (O1)T4B7A1-4 AT BETA = 6



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (C074C9) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 |
| (C074D3) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 |

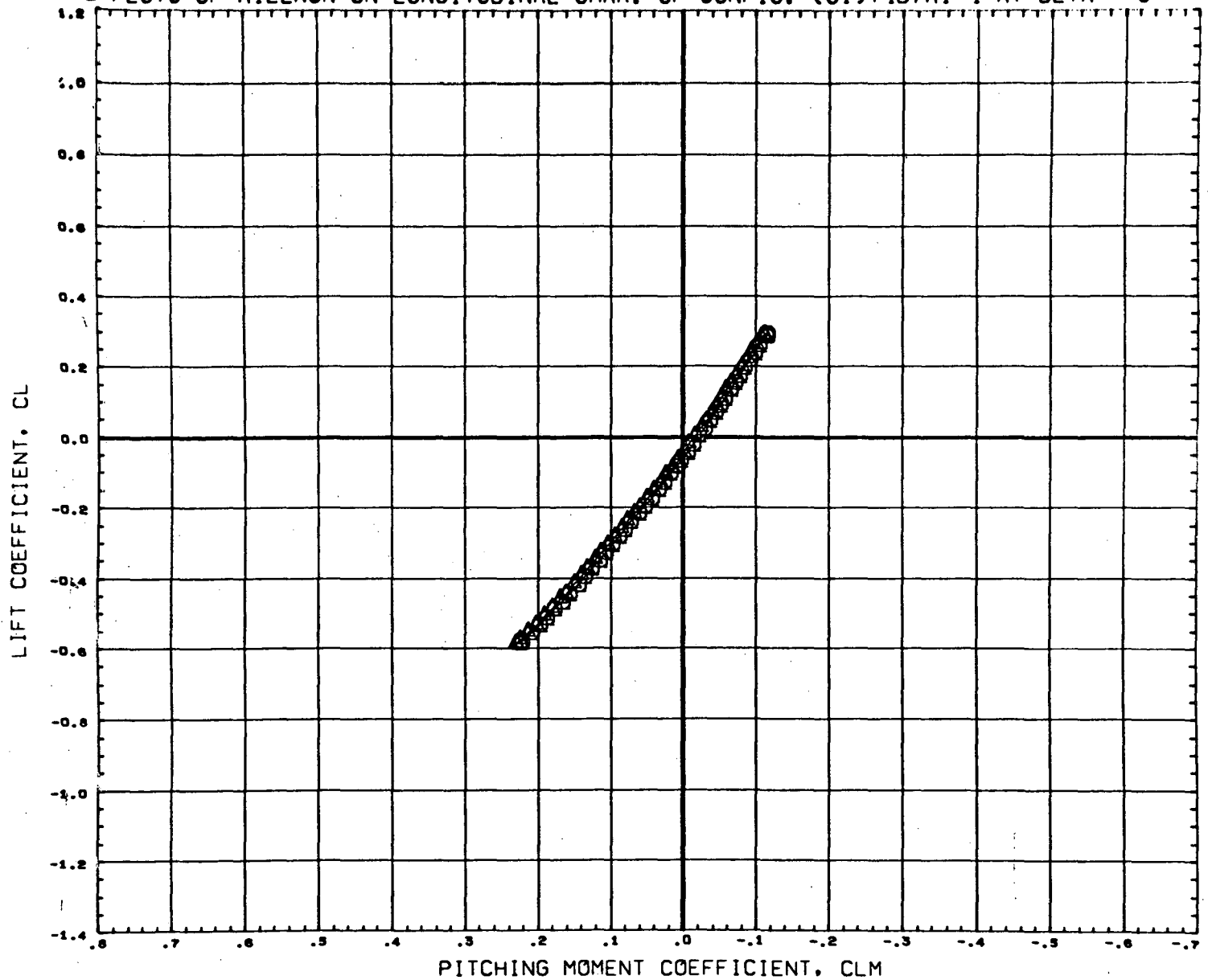
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 6.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 20.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 1.51

PAGE 210

EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6

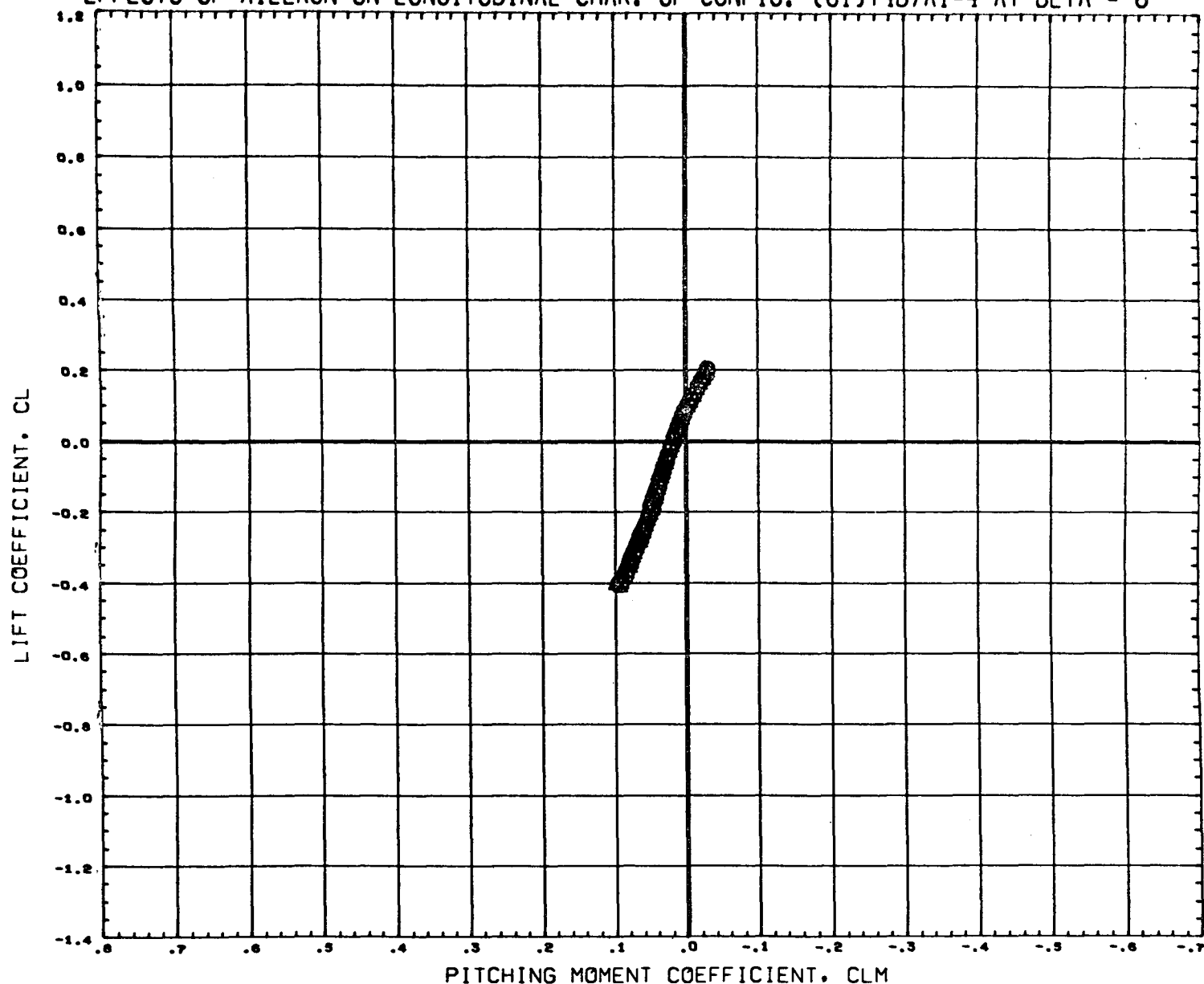


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D3) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 20.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 682.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

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EFFECTS OF AILERON ON LONGITUDINAL CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 6



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C9) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74D3) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

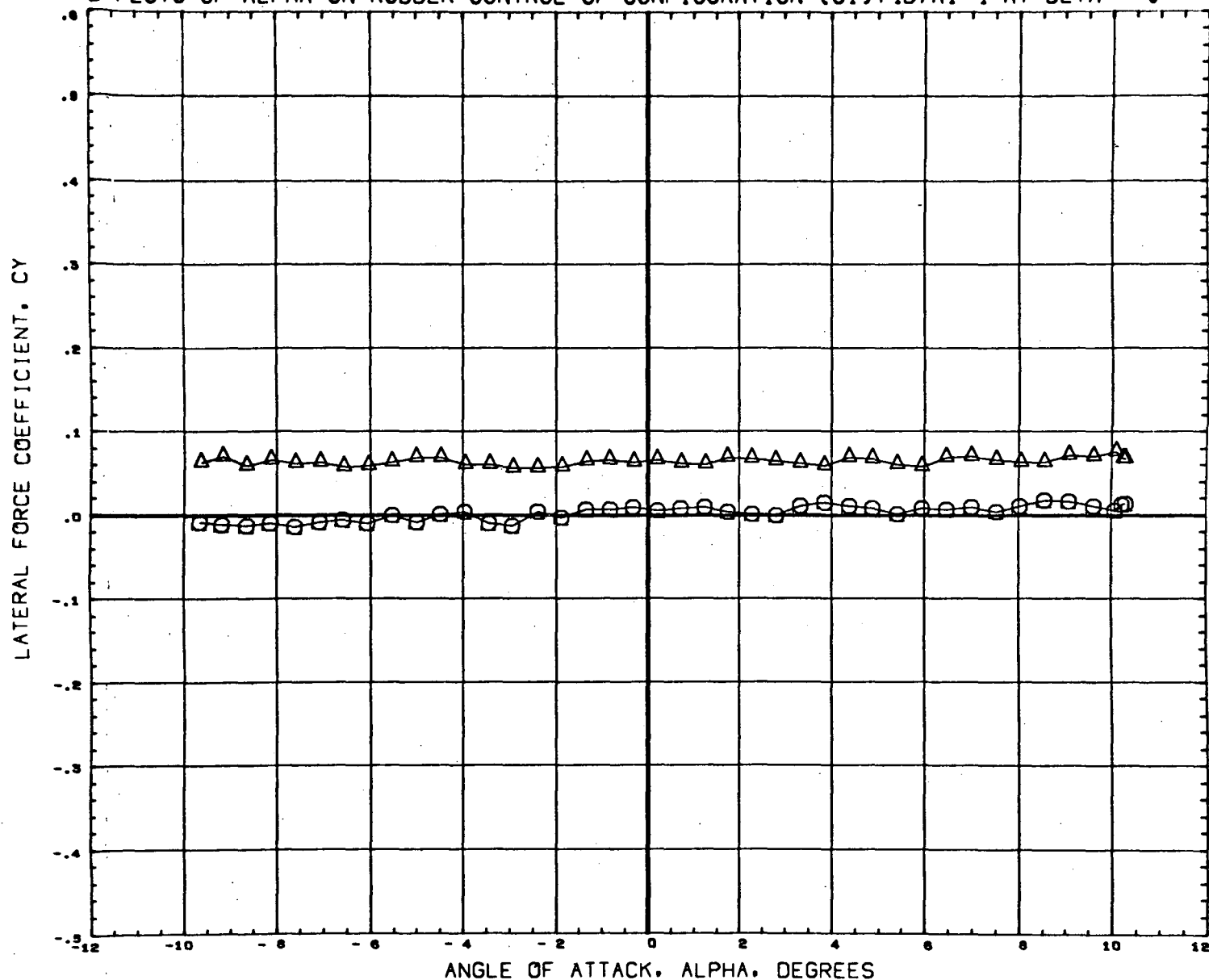
BETA ELEVTR AILRON RUDDER
 6.000 0.000 0.000 0.000
 6.000 0.000 20.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0080 SCALE

MACH 4.47

PAGE 212

EFFECTS OF ALPHA ON RUDDER CONTROL OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0



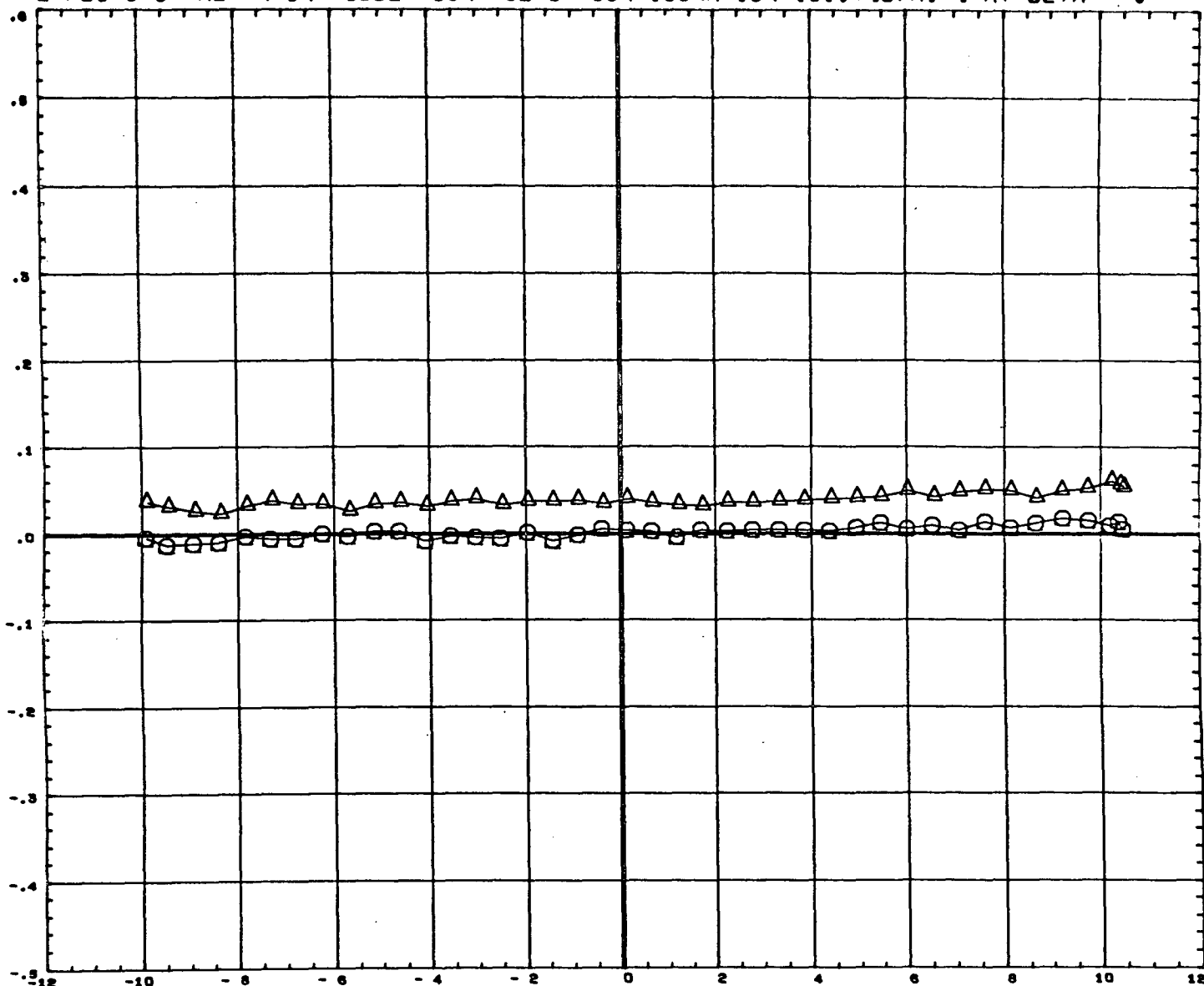
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

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EFFECTS OF ALPHA ON RUDDER CONTROL OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0

LATERAL FORCE COEFFICIENT, CY



ANGLE OF ATTACK, ALPHA, DEGREES

DATA SET SYMBOL CONFIGURATION DESCRIPTION

(RD74C7)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
(RD74D4)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

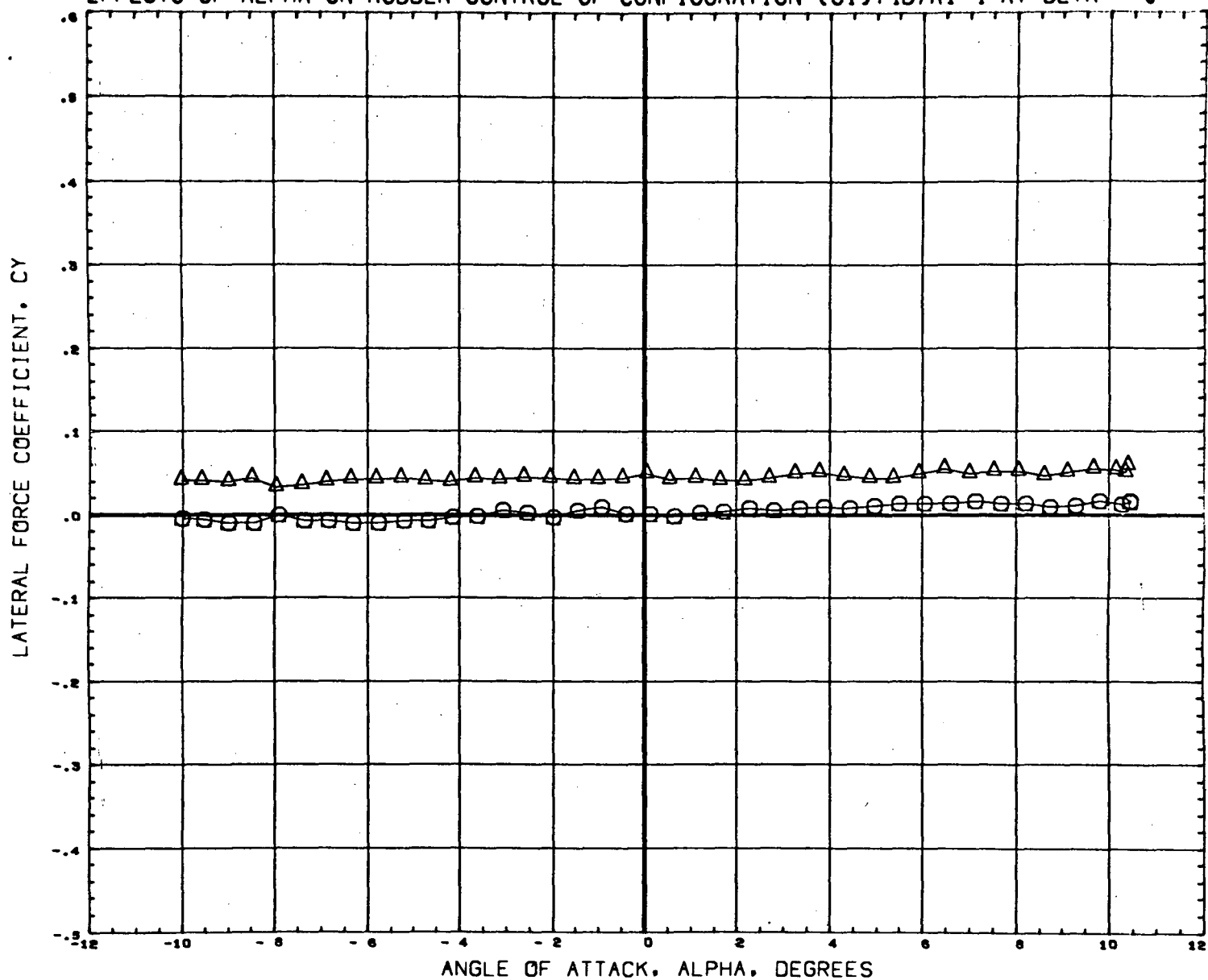
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 10.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 537.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH .90

PAGE 214

EFFECTS OF ALPHA ON RUDDER CONTROL OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0

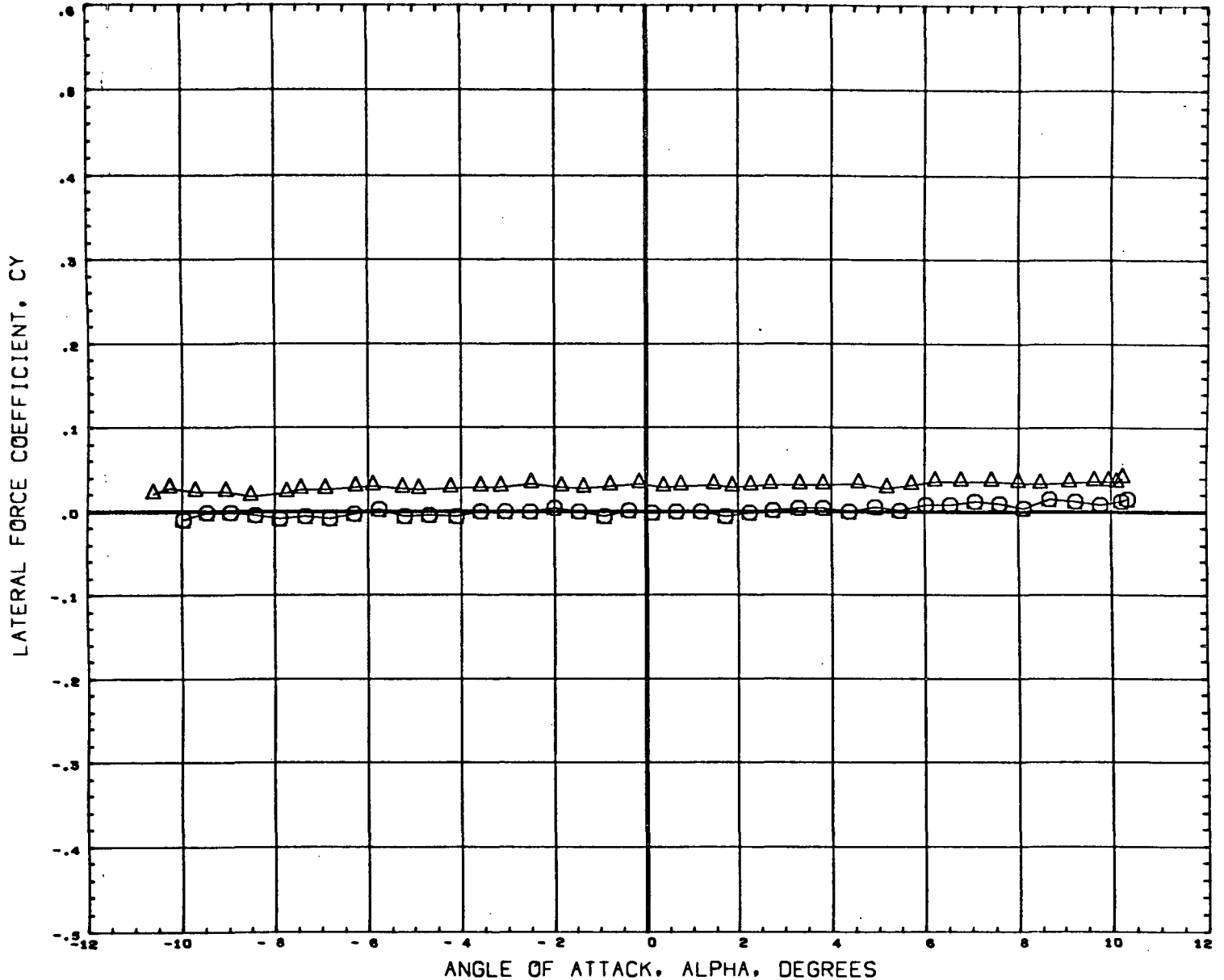


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 337.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

PAGE 215

EFFECTS OF ALPHA ON RUDDER CONTROL OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (RD74C7) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (RD74D4) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

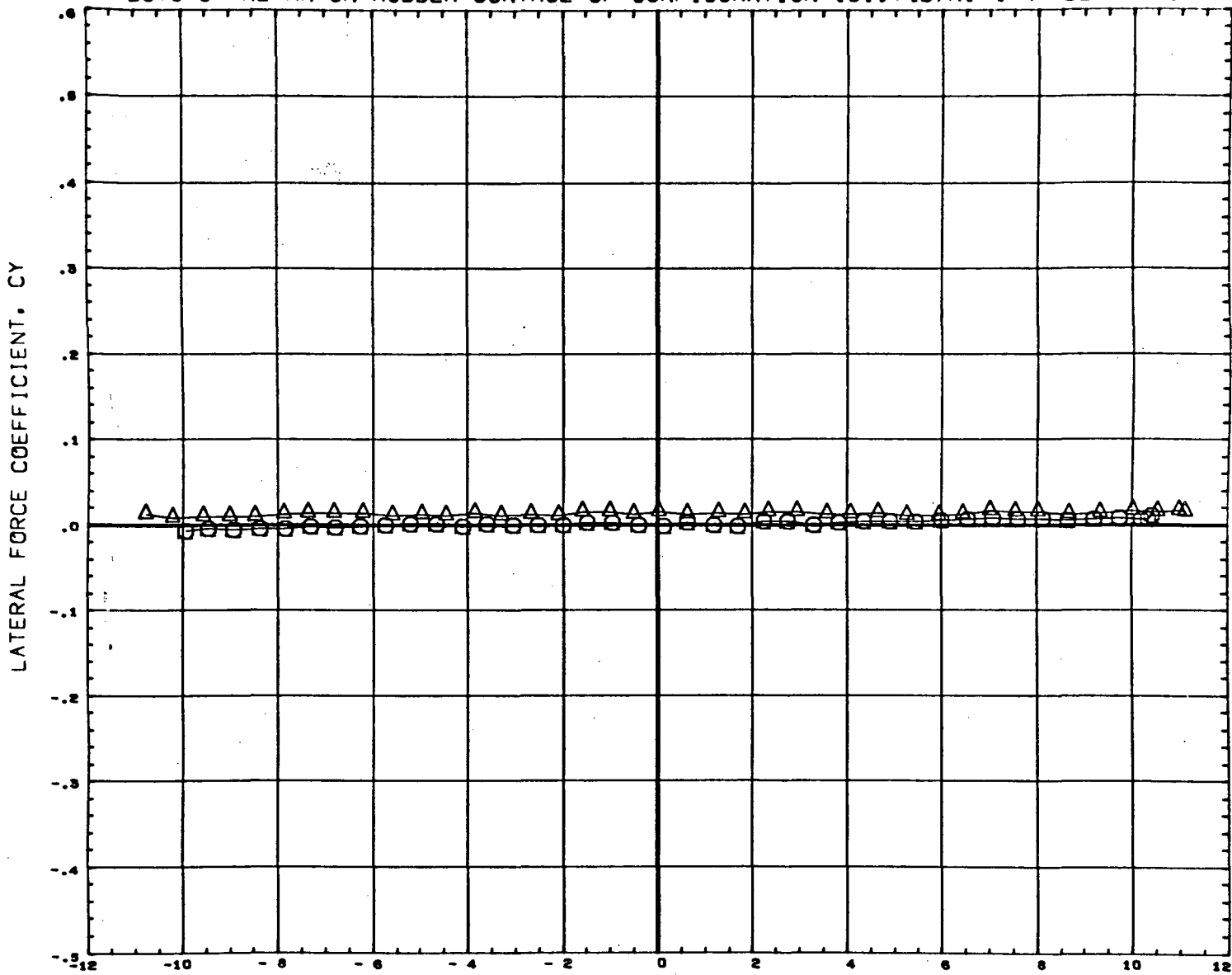
BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 10.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH 1.51

PAGE 216

EFFECTS OF ALPHA ON RUDDER CONTROL OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0

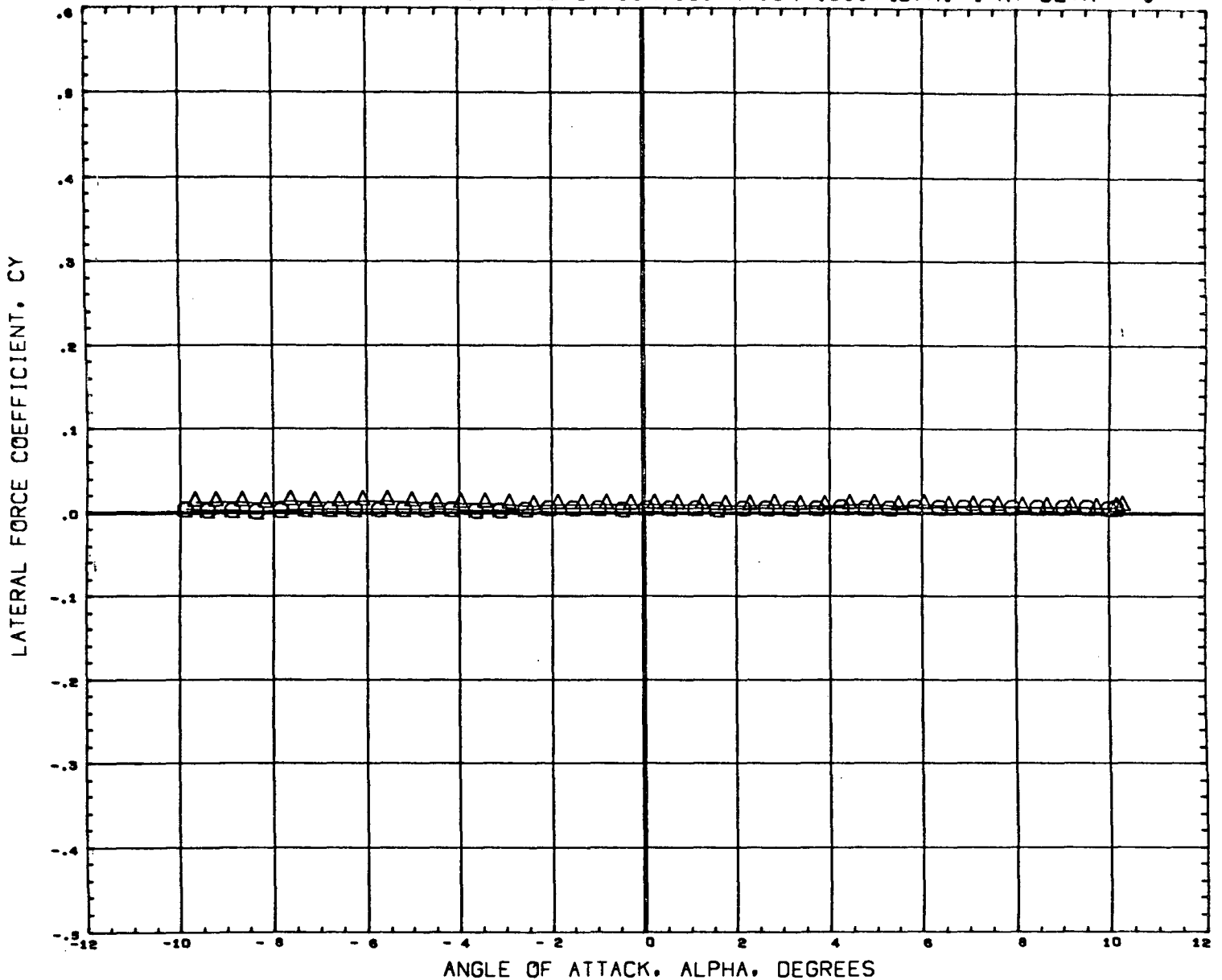


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

PAGE 217

EFFECTS OF ALPHA ON RUDDER CONTROL OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0



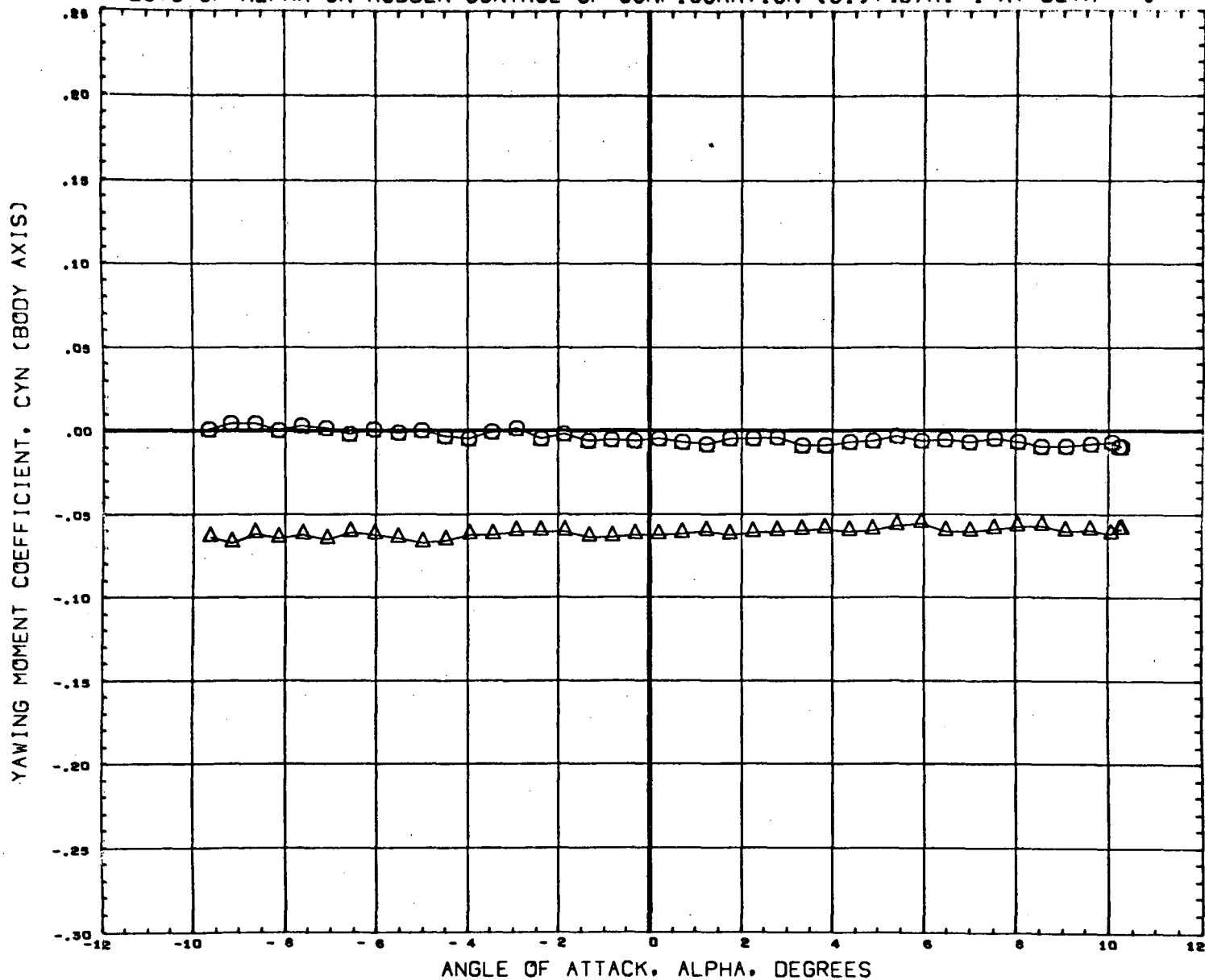
DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (RD74C7) Δ MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (RD74D4) Δ MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 4.47

PAGE 218

EFFECTS OF ALPHA ON RUDDER CONTROL OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0

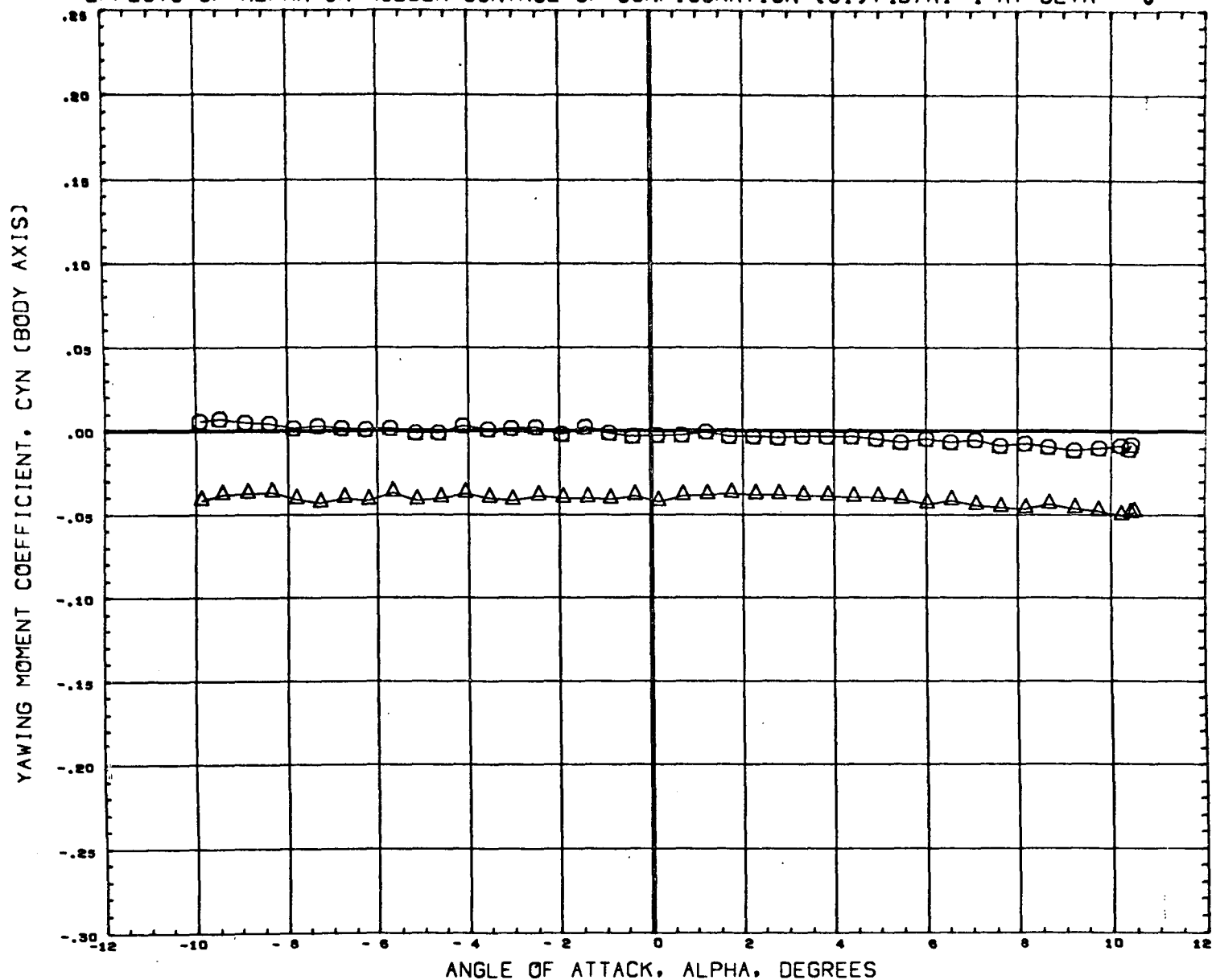


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 662.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

PAGE 219

EFFECTS OF ALPHA ON RUDDER CONTROL OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0

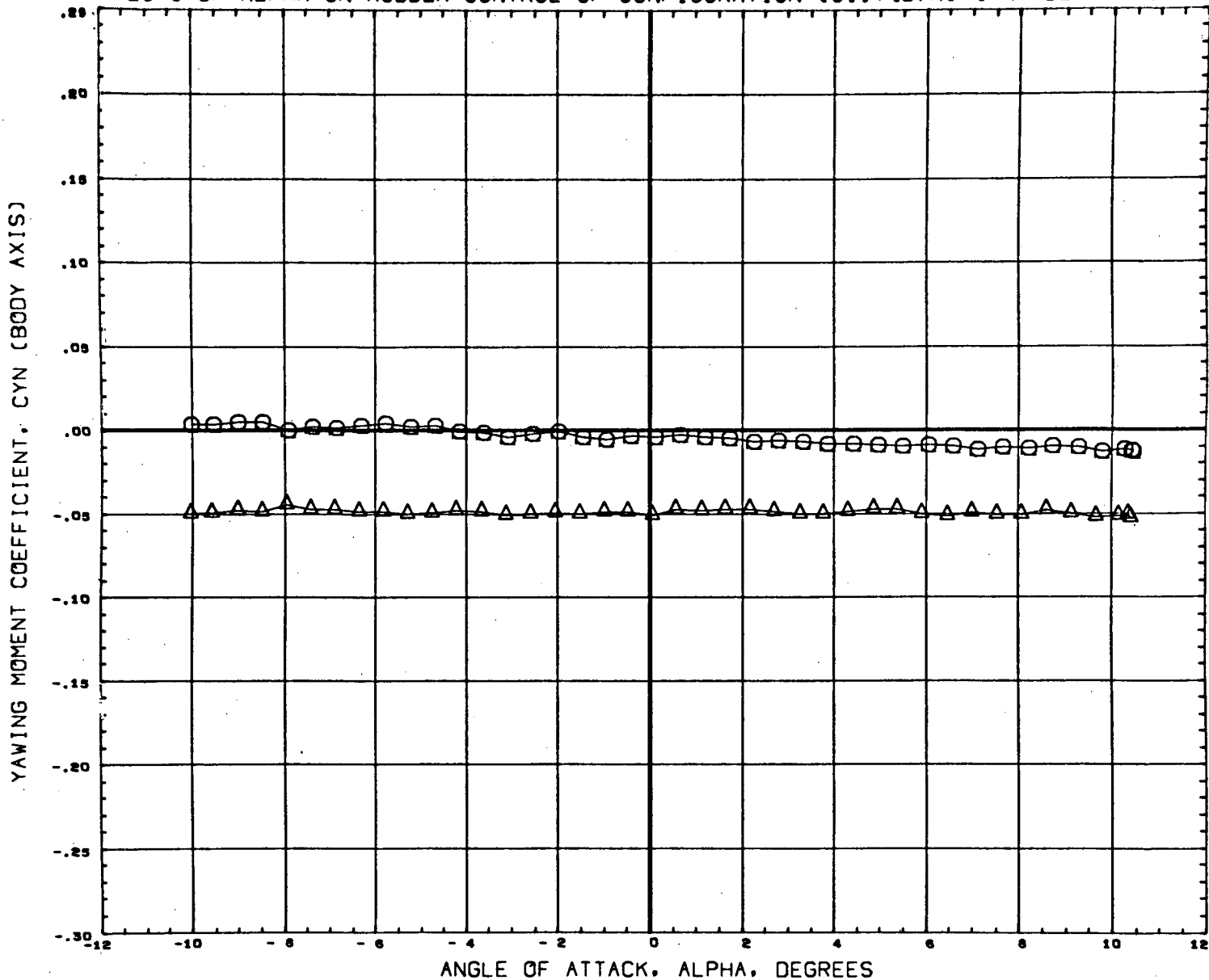


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 997.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

PAGE 220

EFFECTS OF ALPHA ON RUDDER CONTROL OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0

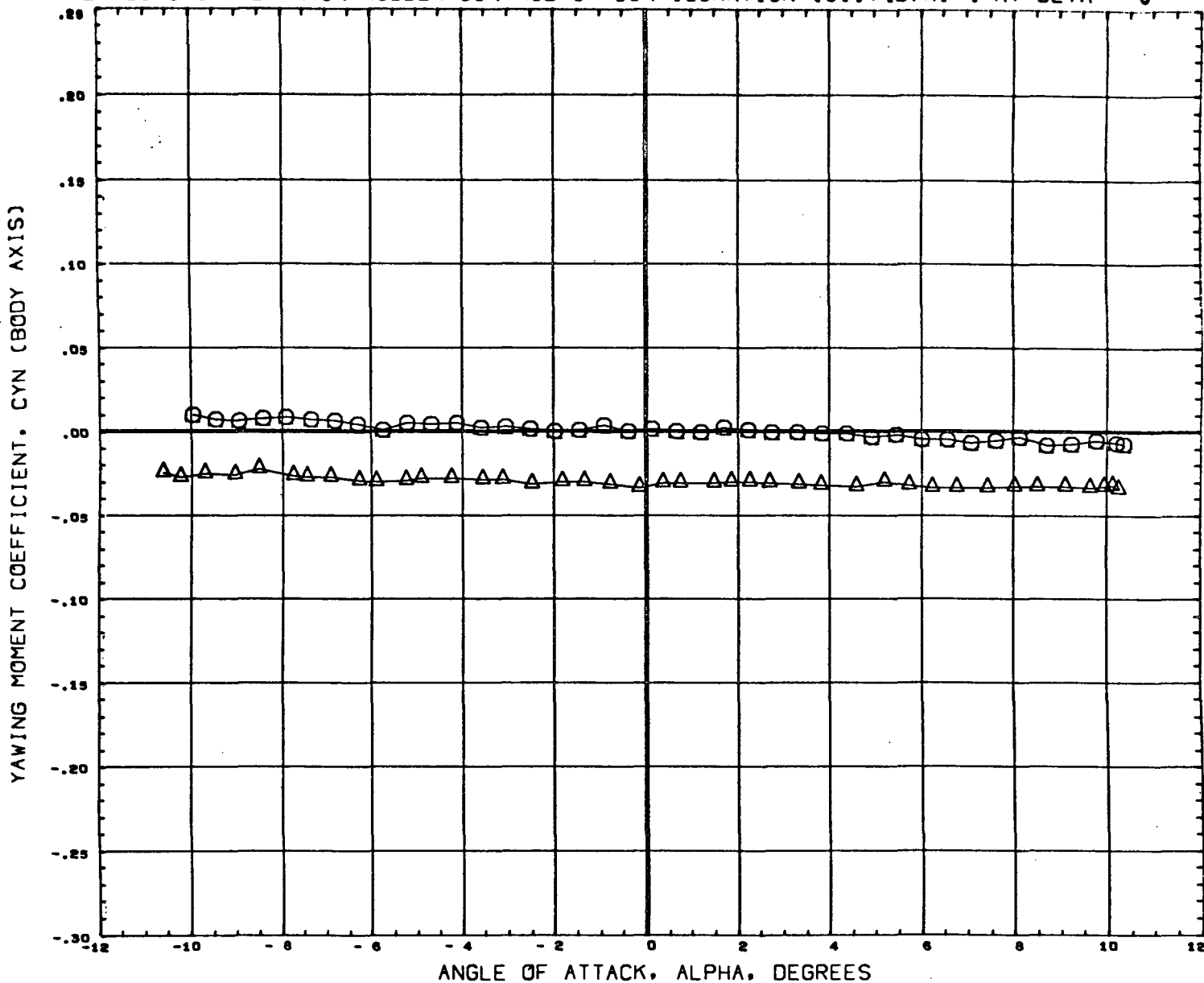


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | NDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D4) | NDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

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EFFECTS OF ALPHA ON RUDDER CONTROL OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0



| | |
|-----------------|---|
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
| (RD74C7) | MDAC S-222 COMPOSITE (T-CG) (01) T4B7A1-4 |
| (RD74D4) | MDAC S-222 COMPOSITE (T-CG) (01) T4B7A1-4 |

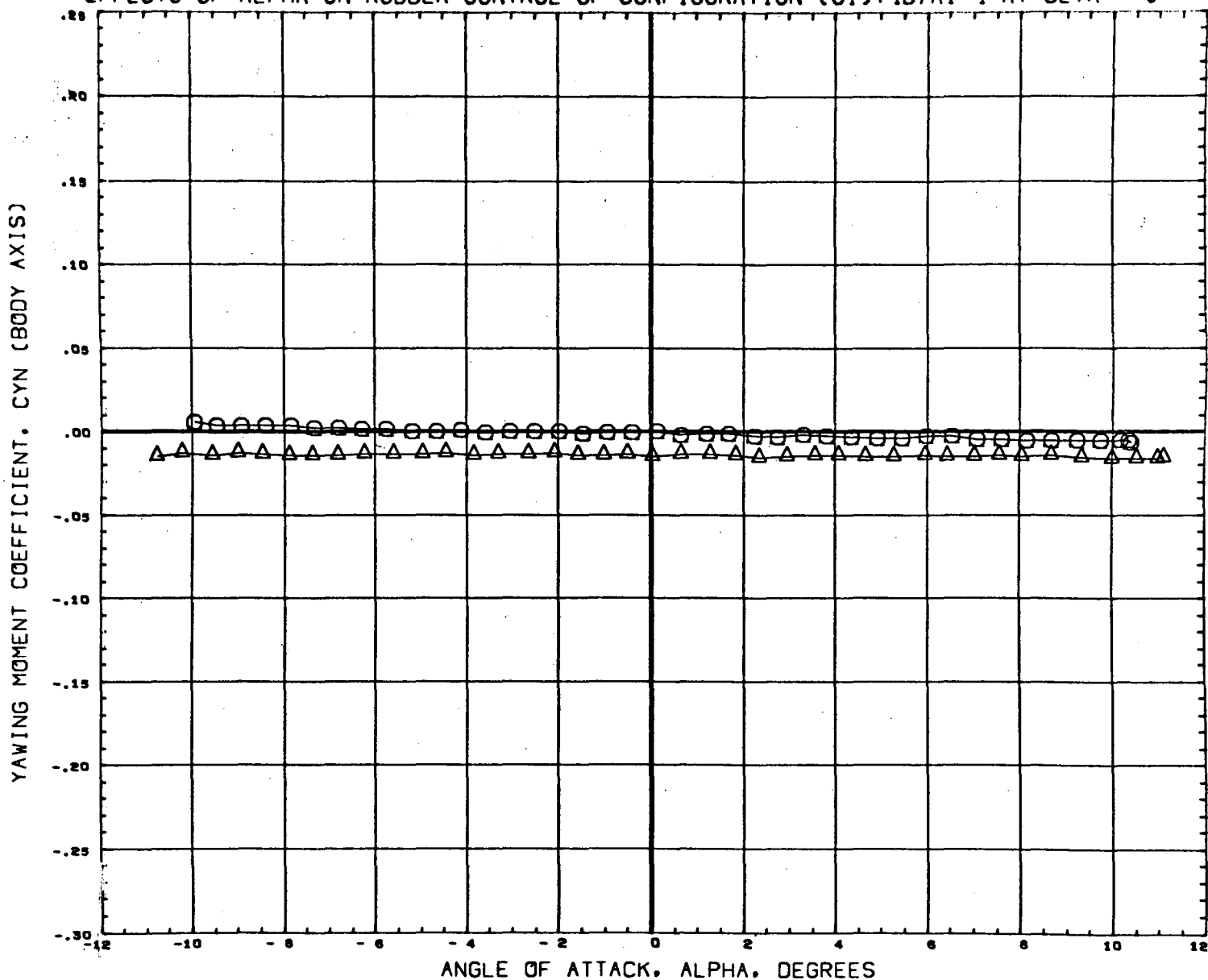
| | | | |
|-------|--------|--------|--------|
| BETA | ELEVTR | AILRON | RUDDER |
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 10.000 |

| | |
|-----------------------|------------------|
| REFERENCE INFORMATION | |
| SREF | 3155.3040 SQ.FT. |
| LREF | 609.5004 IN. |
| BREF | 862.0004 IN. |
| XMRP | 557.0004 IN. |
| YMRP | 0.0000 IN. |
| ZMRP | 200.0004 IN. |
| SCALE | 0.0060 SCALE |

MACH 1.51

PAGE 222

EFFECTS OF ALPHA ON RUDDER CONTROL OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0

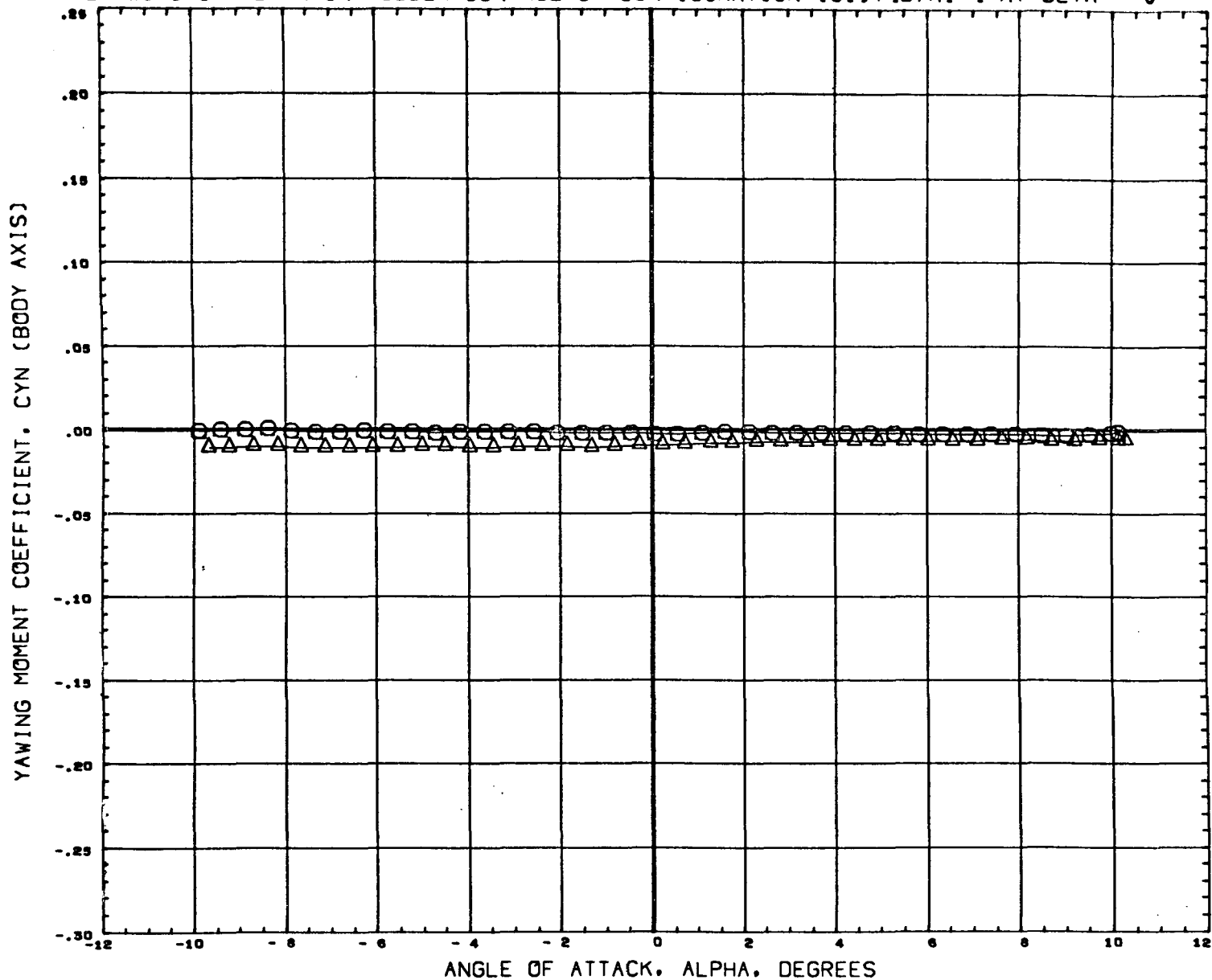


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.3004 IN. |
| | | | | | | BREF | 692.0004 IN. |
| | | | | | | XMRP | 337.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

PAGE 223

EFFECTS OF ALPHA ON RUDDER CONTROL OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (RD74C7) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (RD74D4) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

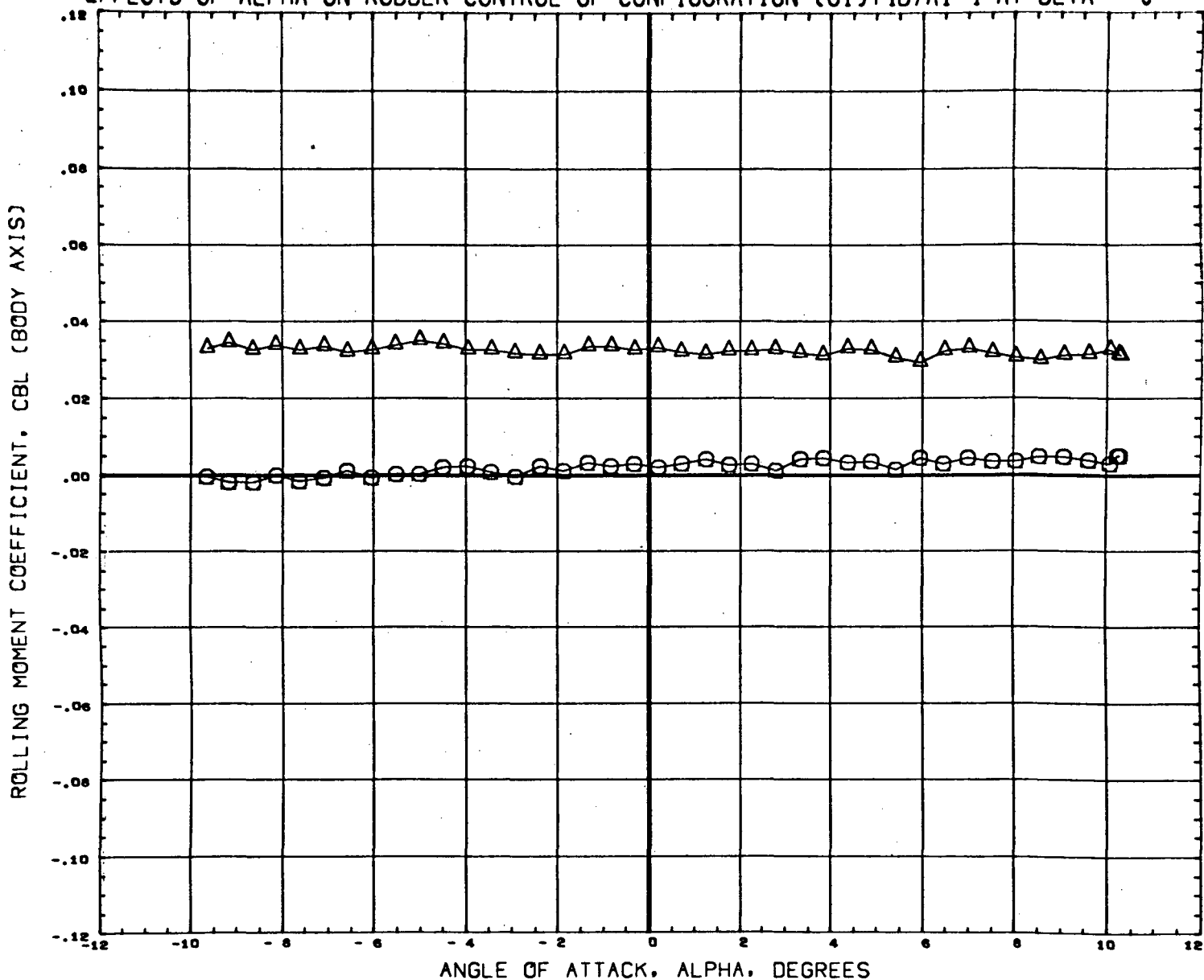
BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 10.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH 4.47

PAGE 224

EFFECTS OF ALPHA ON RUDDER CONTROL OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0



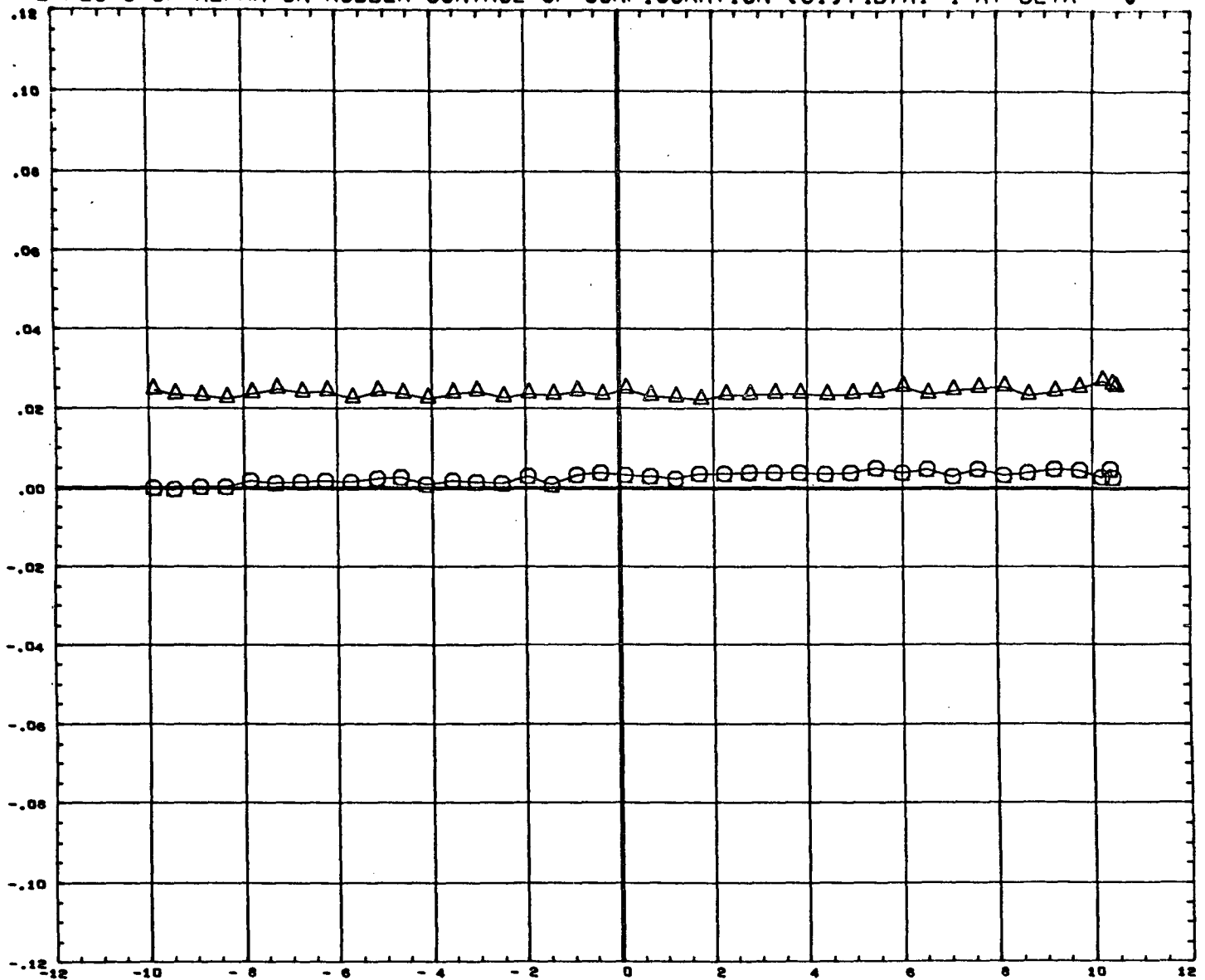
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 537.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

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EFFECTS OF ALPHA ON RUDDER CONTROL OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



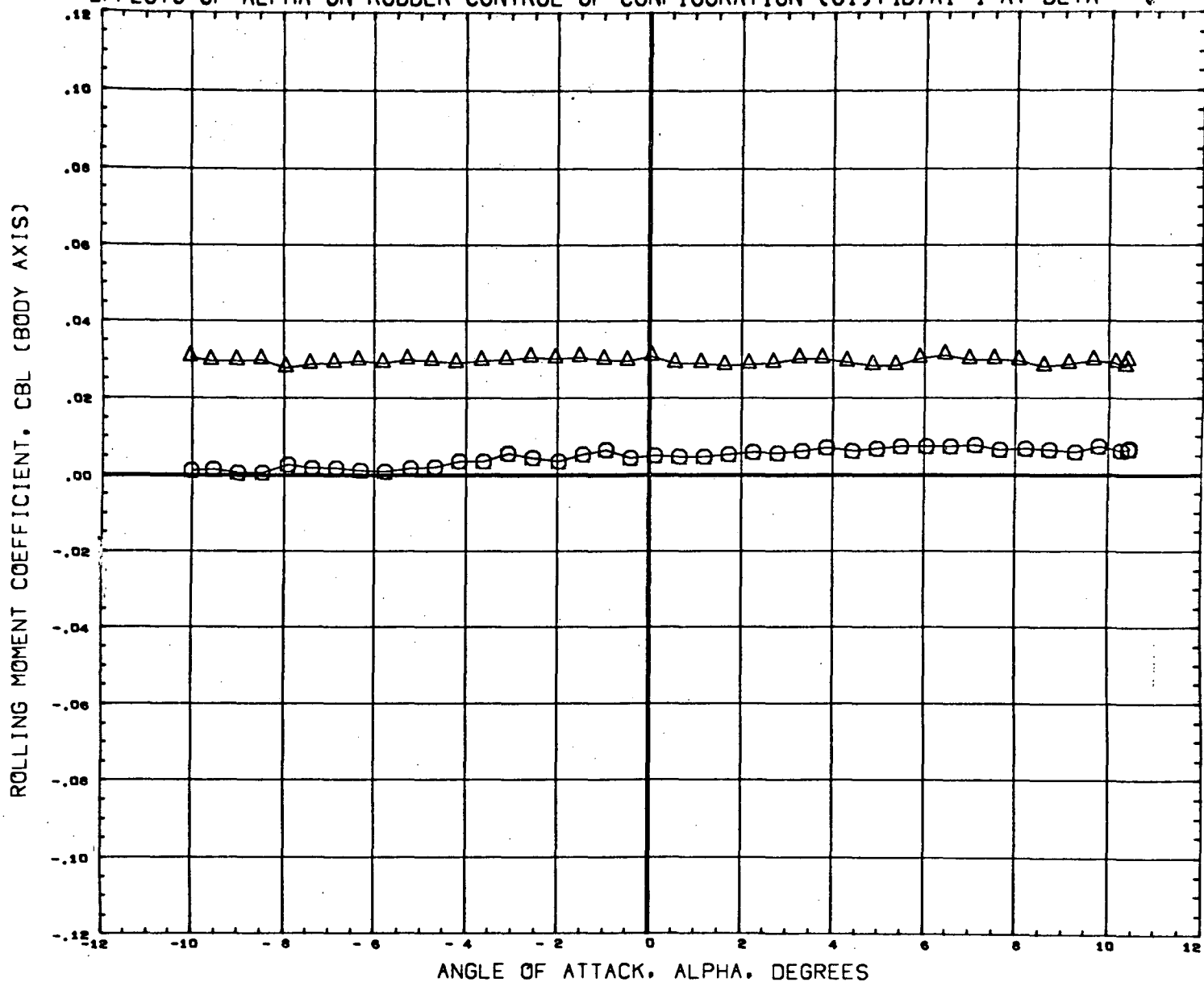
ANGLE OF ATTACK, ALPHA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

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EFFECTS OF ALPHA ON RUDDER CONTROL OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0



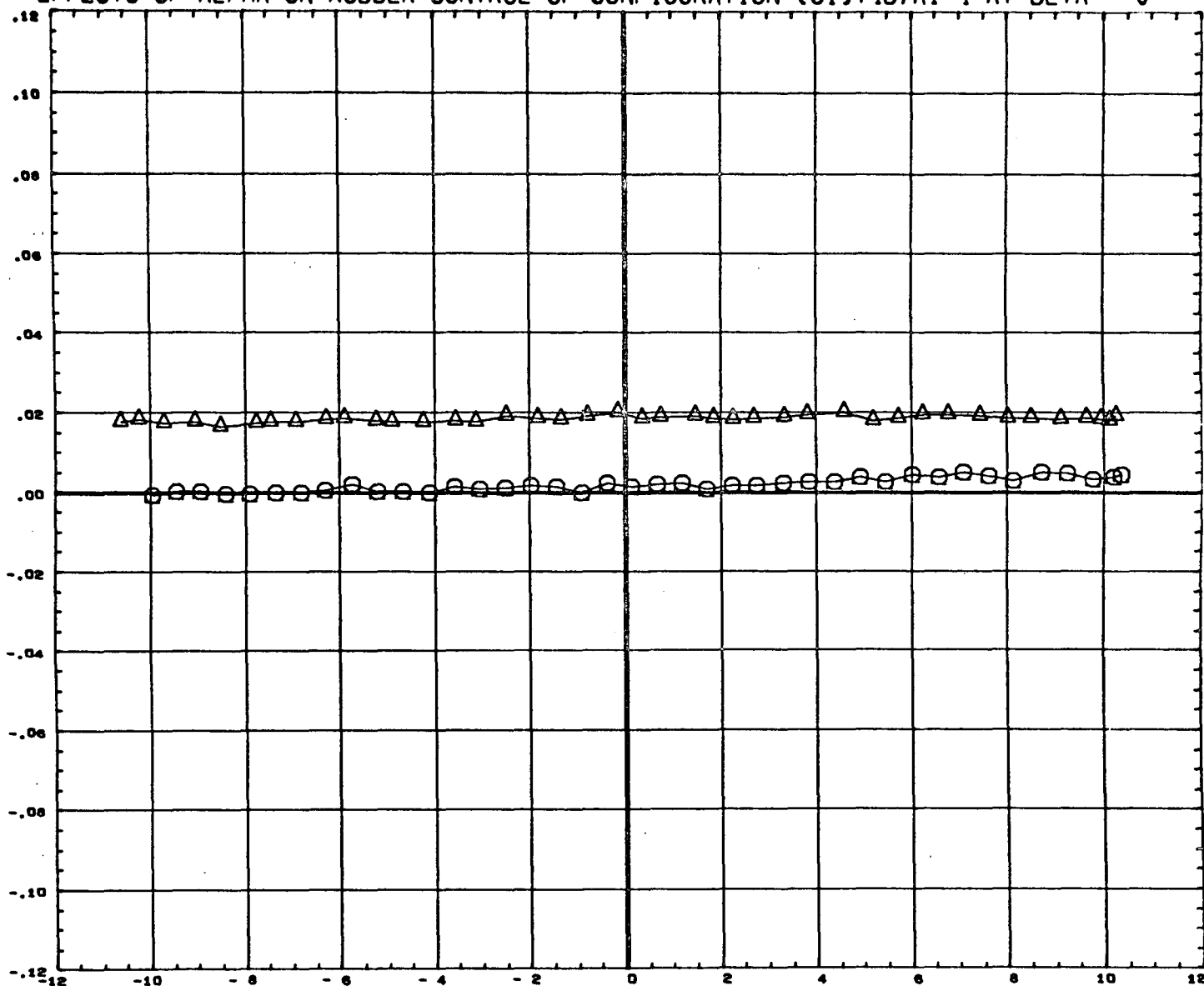
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | NDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D4) | NDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

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EFFECTS OF ALPHA ON RUDDER CONTROL OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



ANGLE OF ATTACK, ALPHA, DEGREES

DATA SET SYMBOL CONFIGURATION DESCRIPTION

(RD74C7) ○ MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
(RD74D4) Δ MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

BETA ELEVTR AILRON RUDDER
0.000 0.000 0.000 0.000
0.000 0.000 0.000 10.000

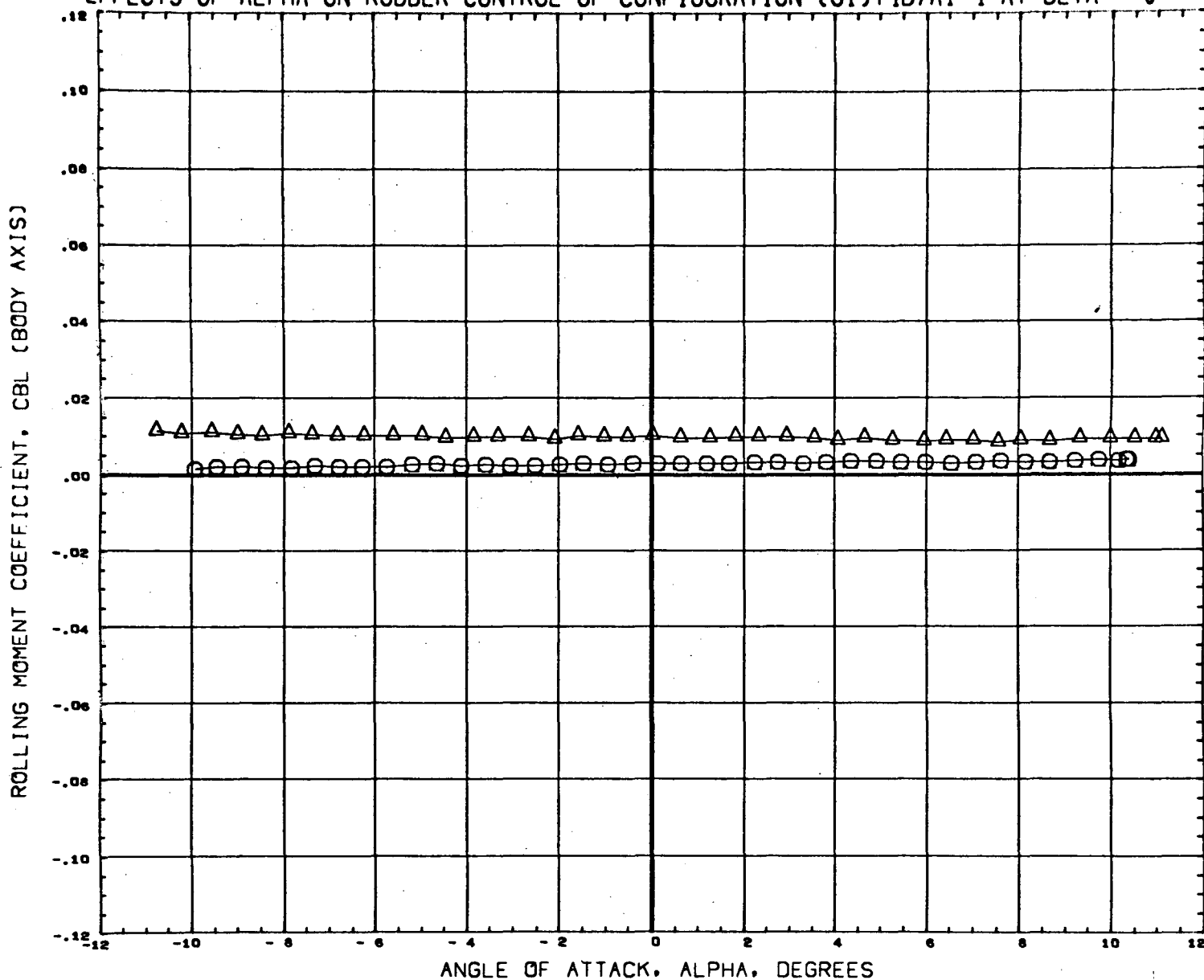
REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060 SCALE

MACH

1.51

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EFFECTS OF ALPHA ON RUDDER CONTROL OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0

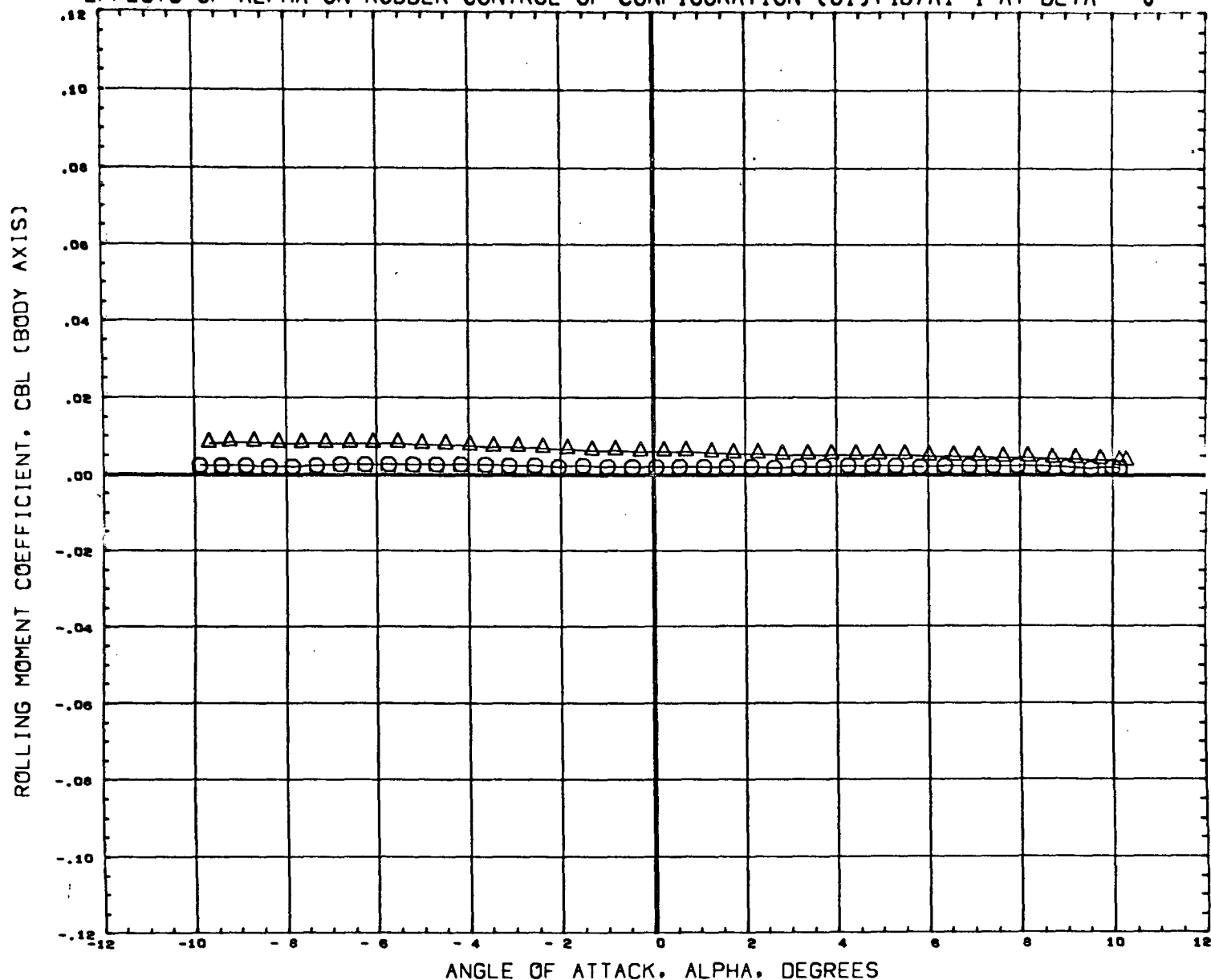


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

PAGE 229

EFFECTS OF ALPHA ON RUDDER CONTROL OF CONFIGURATION (01)T4B7A1-4 AT BETA = 0



ANGLE OF ATTACK, ALPHA, DEGREES

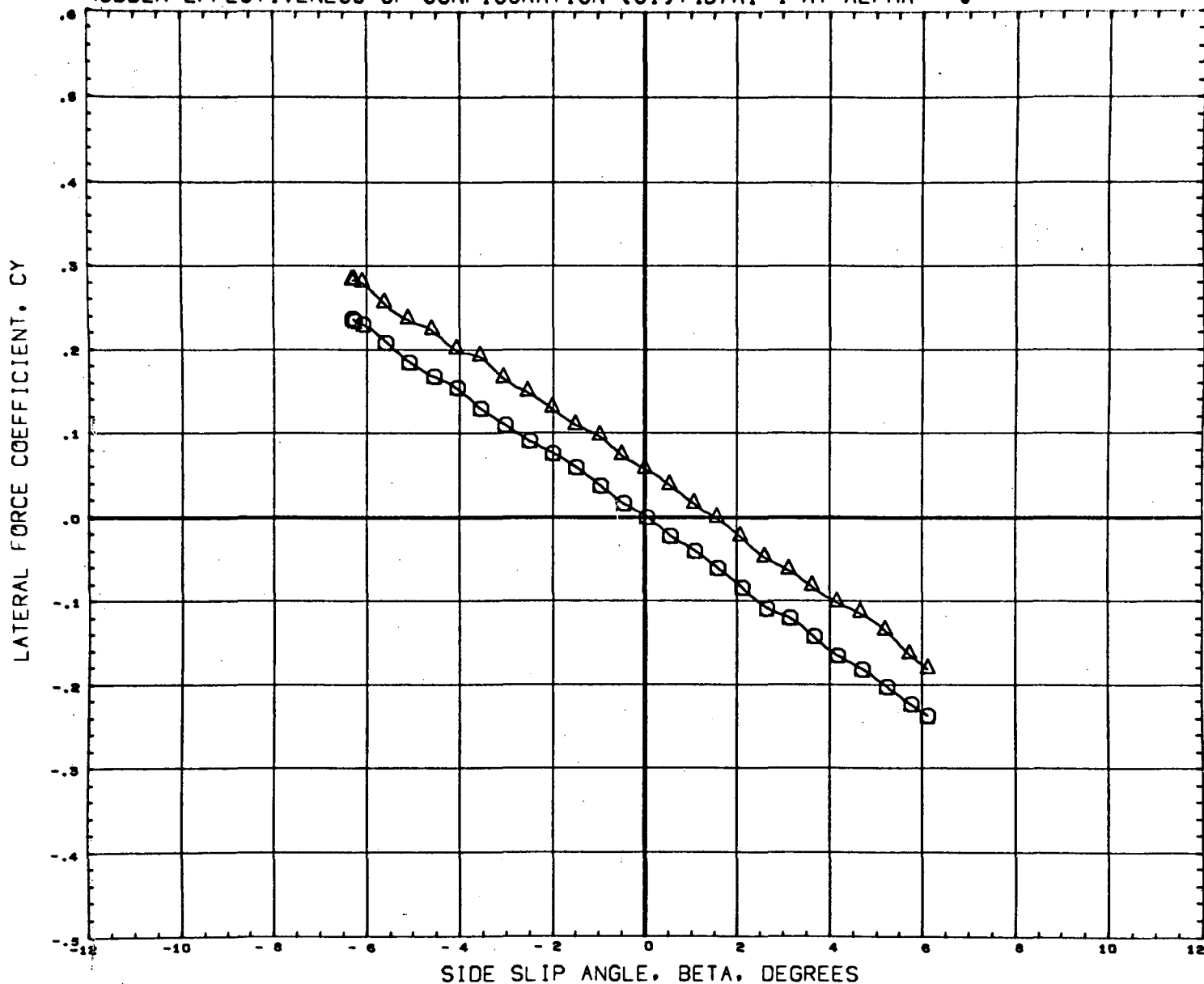
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.3004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH

4.47

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RUDDER EFFECTIVENESS OF CONFIGURATION (O1)T4B7A1-4 AT ALPHA = 0

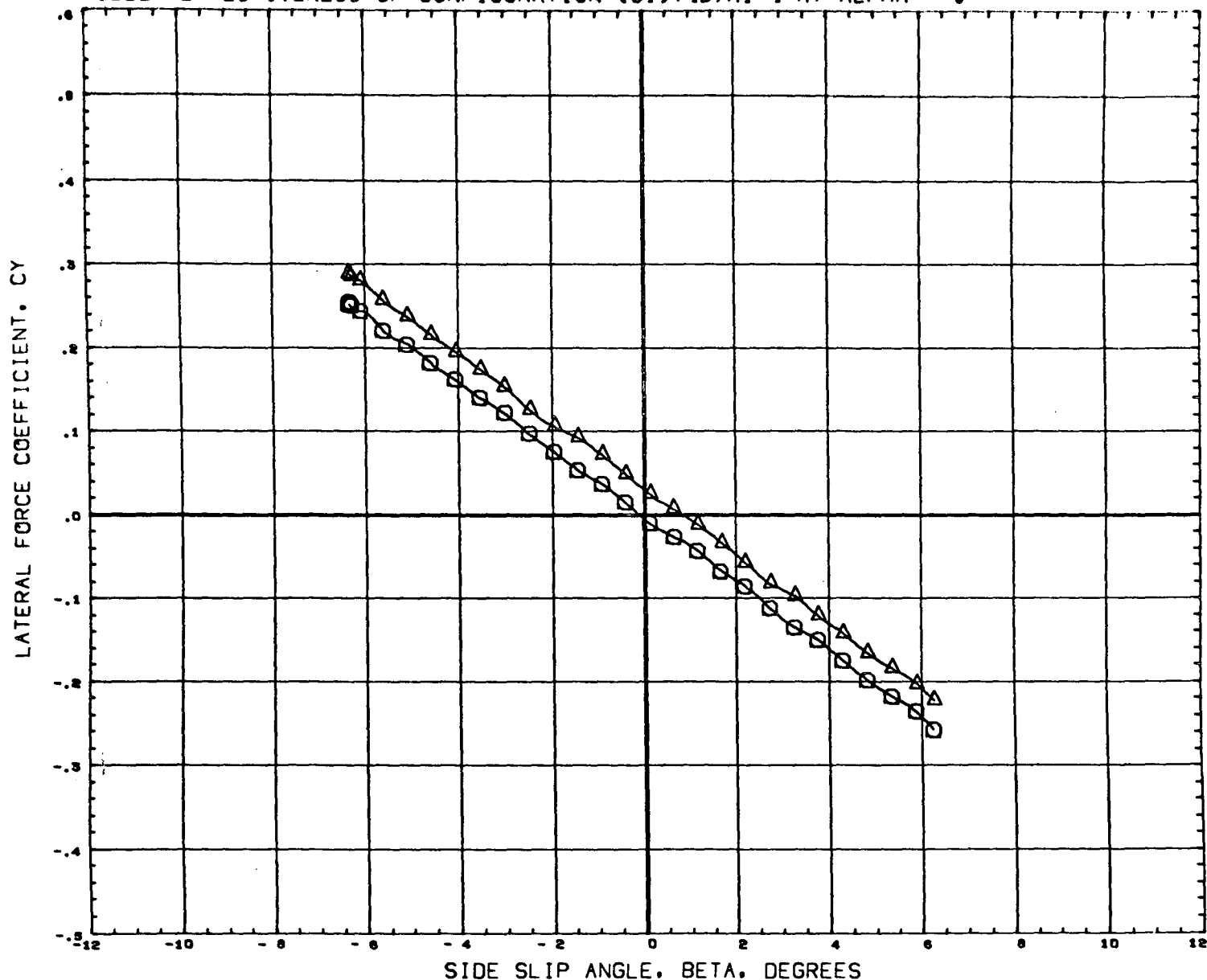


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D5) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRF | 557.0004 IN. |
| | | | | | | YMRF | 0.0000 IN. |
| | | | | | | ZMRF | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

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RUDDER EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

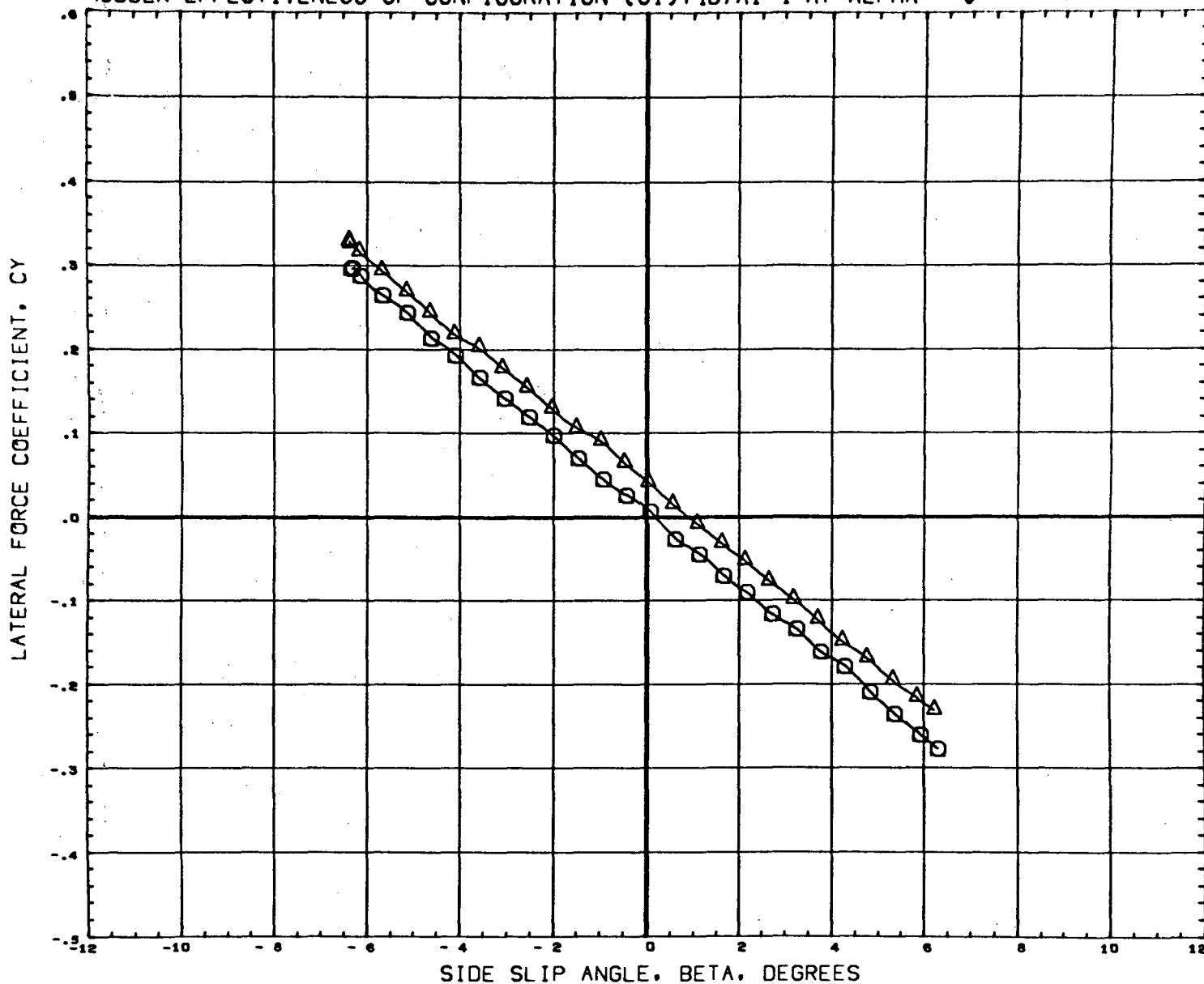


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-----------------|--|-------|--------|--------|--------|-----------------------|-----------|--------|
| (TD74C8) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| (RD74D5) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 | IN. |
| | | | | | | BREF | 882.0004 | IN. |
| | | | | | | XMRP | 557.0004 | IN. |
| | | | | | | YMRP | 0.0000 | IN. |
| | | | | | | ZMRP | 200.0004 | IN. |
| | | | | | | SCALE | 0.0060 | SCALE |

MACH .90

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RUDDER EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C8) (RD74D5) (01)T4B7A1-4
 (01)T4B7A1-4

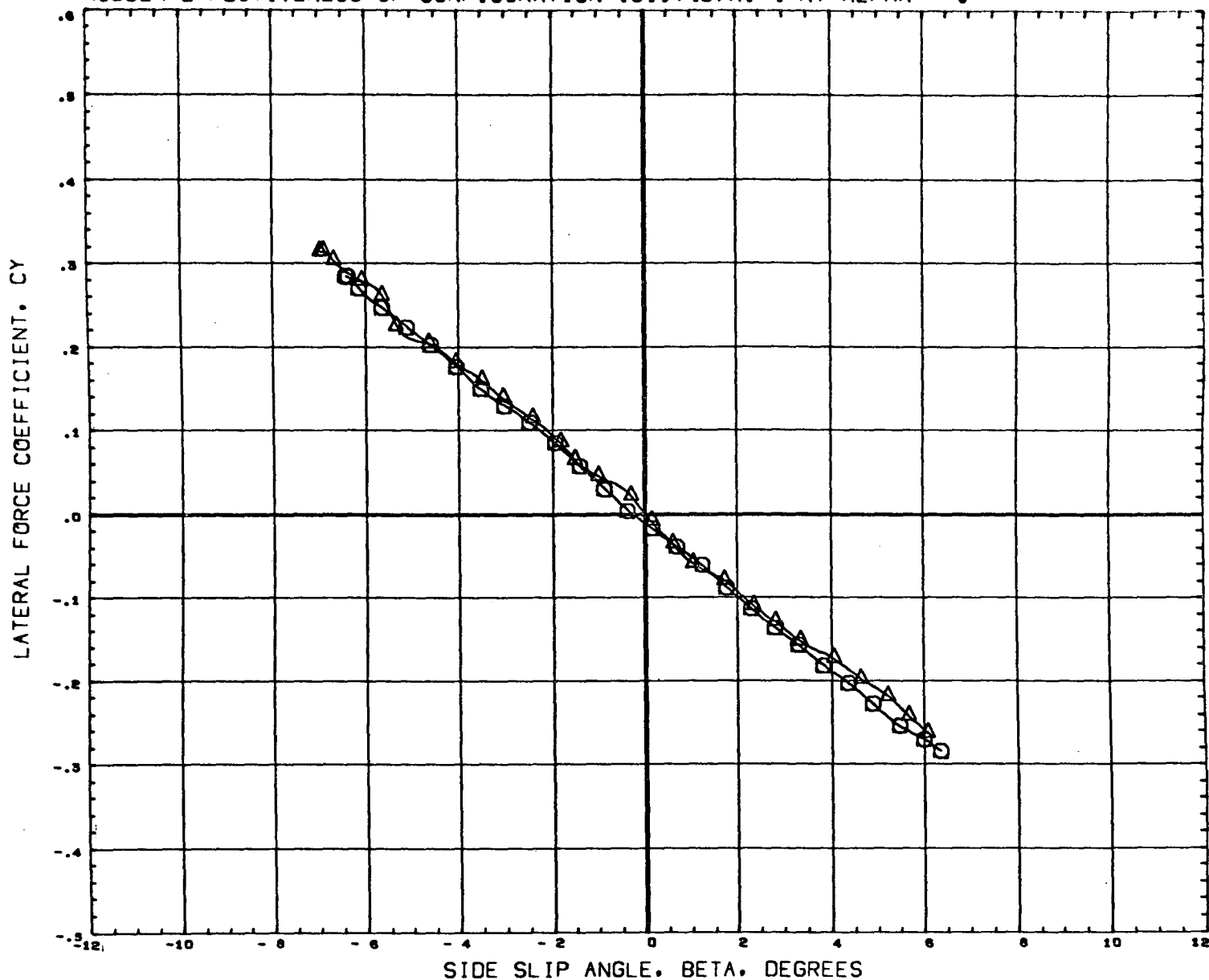
ALPHA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 10.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 662.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH 1.08

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RUDDER EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

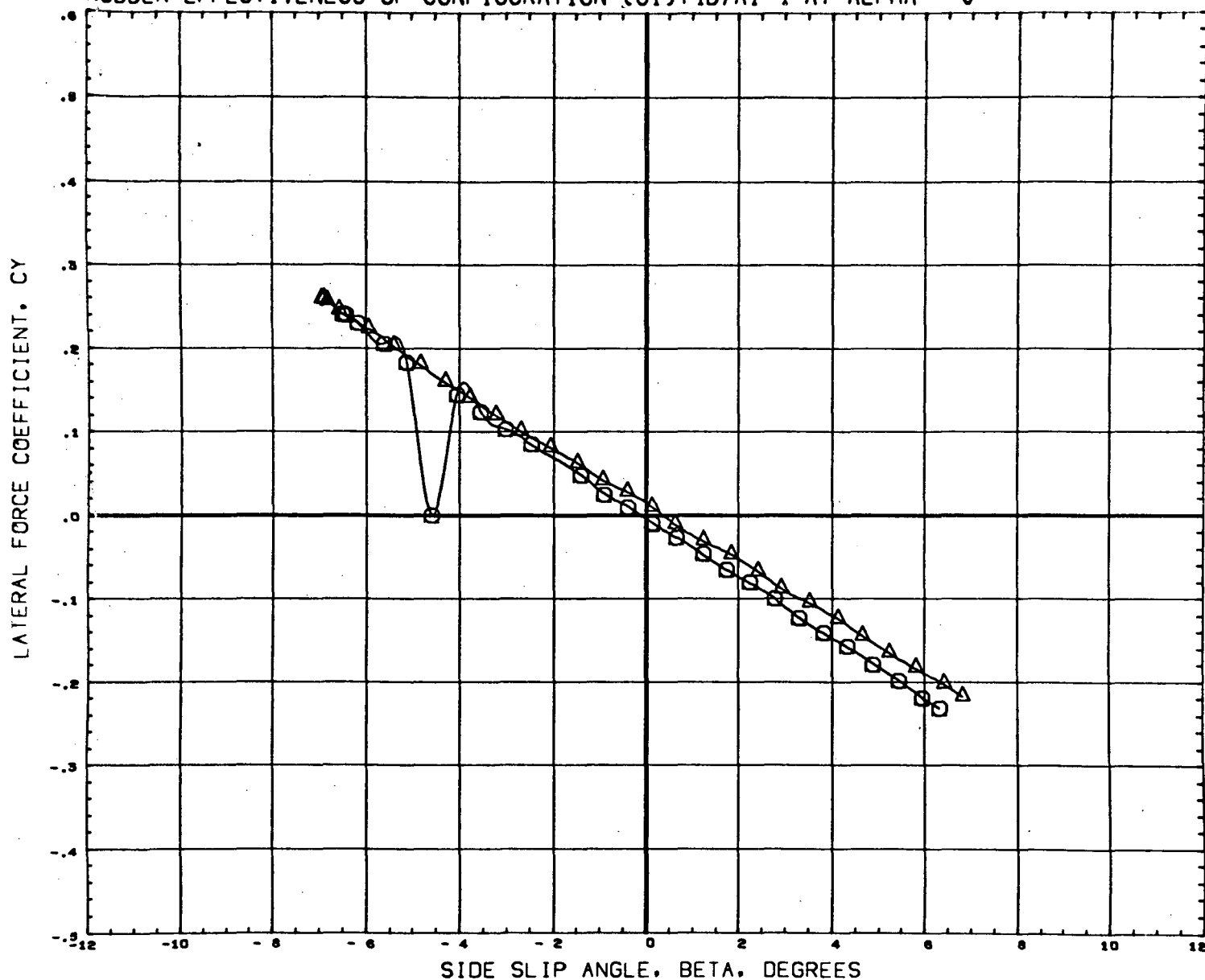


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D5) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.9004 IN. |
| | | | | | | BREF | 862.0004 IN. |
| | | | | | | YMRP | 557.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.51

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RUDDER EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0



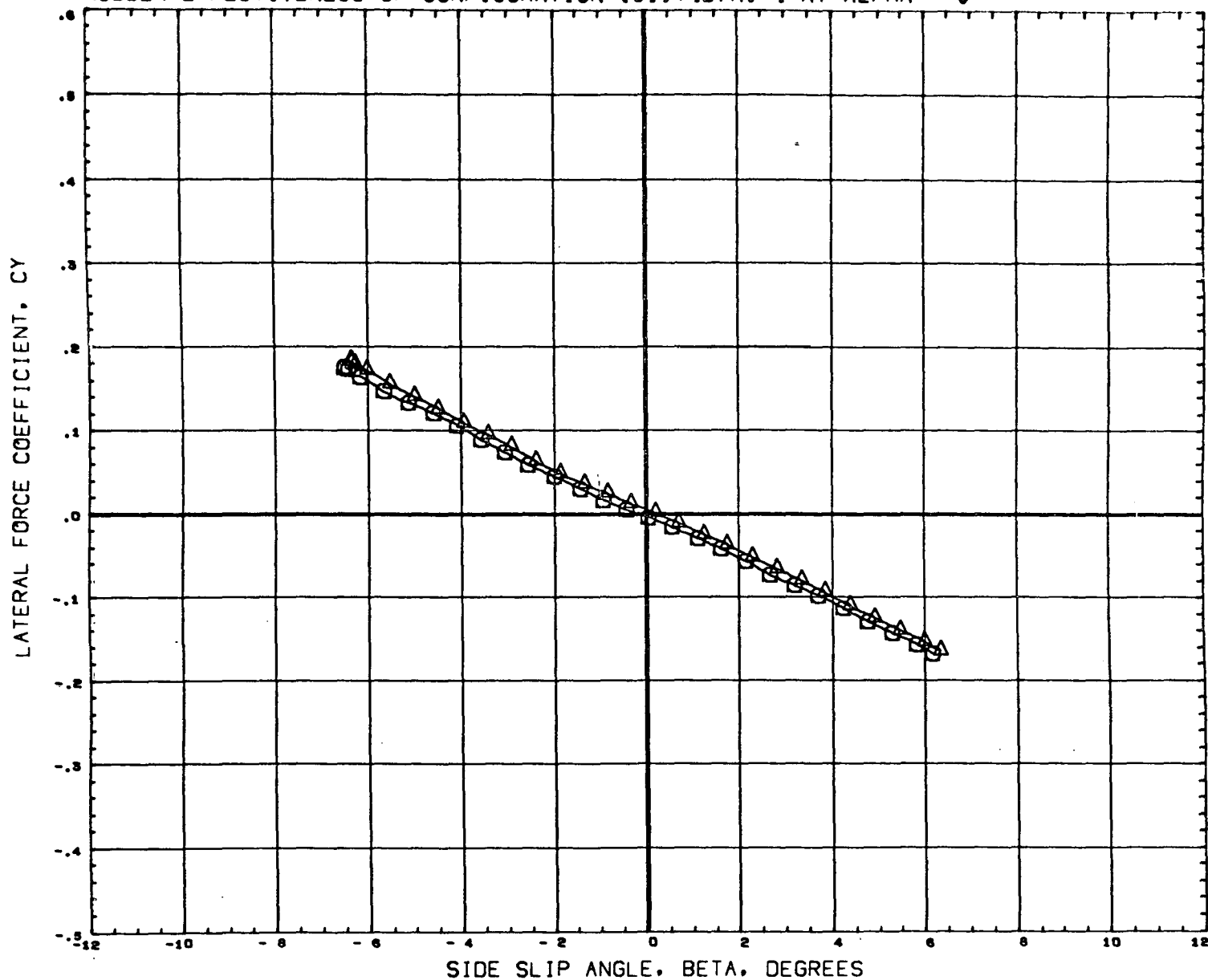
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (RD74D5) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |

| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | BREF | 682.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 2.20

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RUDDER EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (TD74C8) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (RD74D5) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |

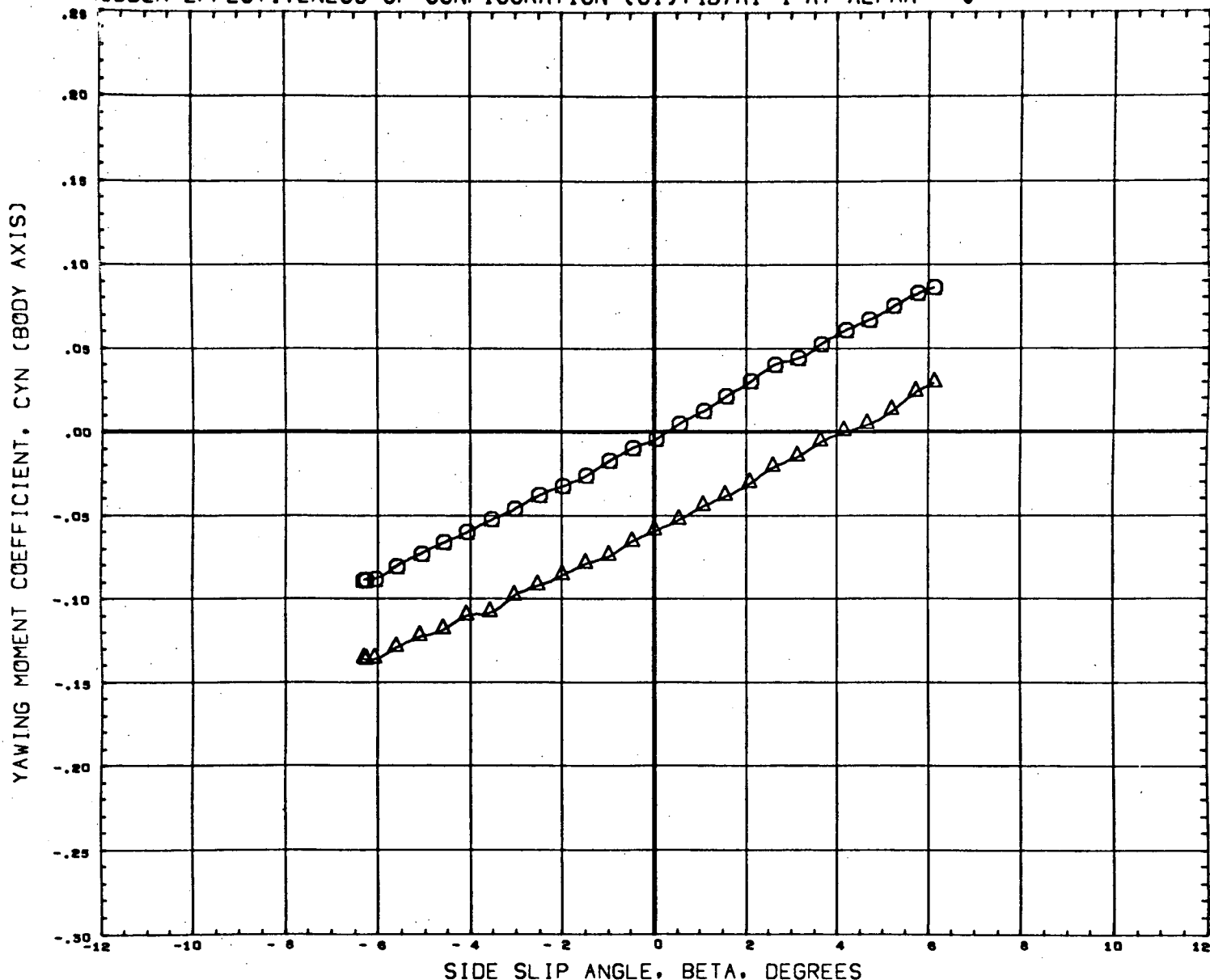
| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 10.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|---------|
| SREF | 3155.3040 | SQ. FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 4.47

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RUDDER EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0



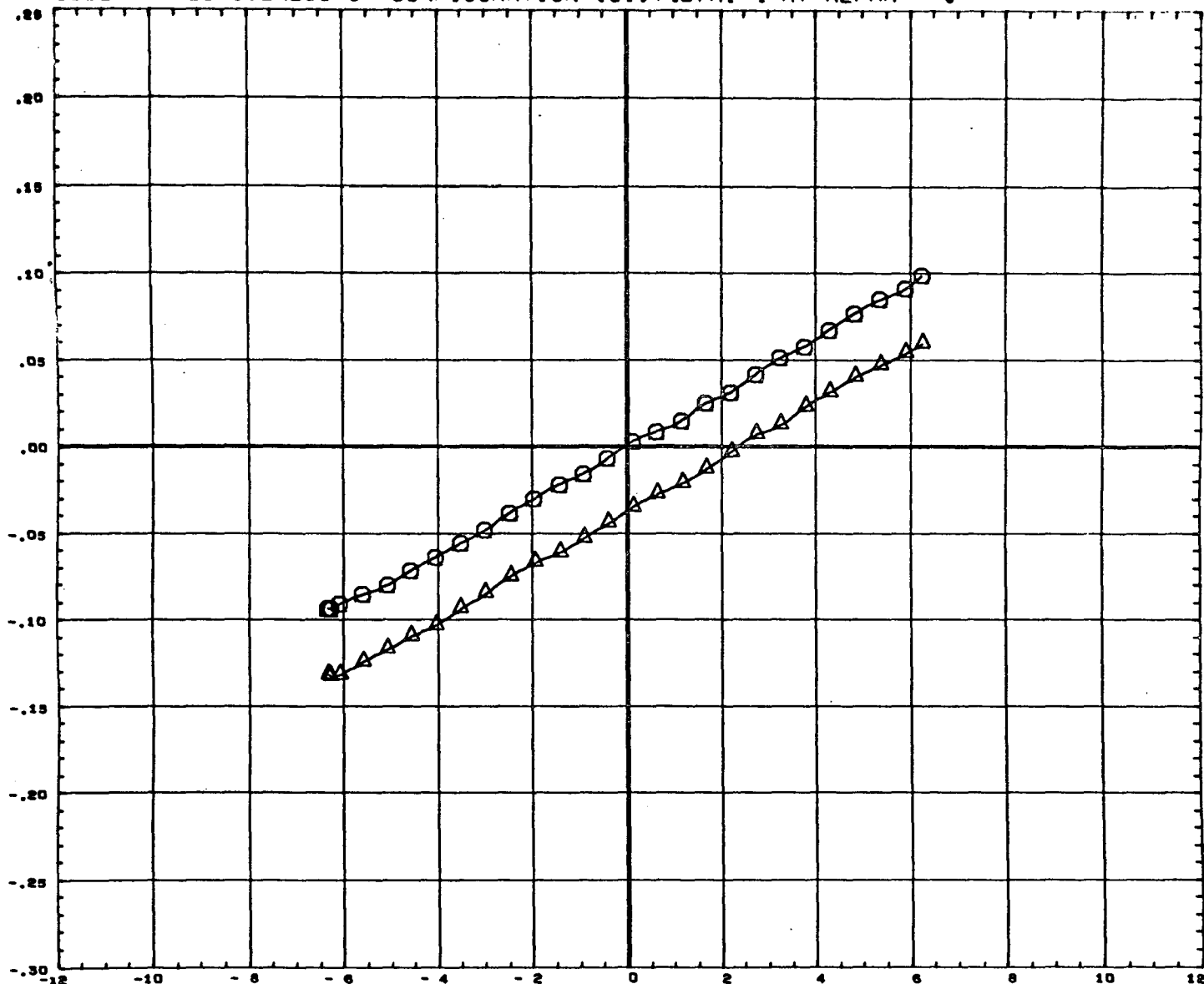
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D5) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

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RUDDER EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

YAWING MOMENT COEFFICIENT, CYN (BODY AXIS)



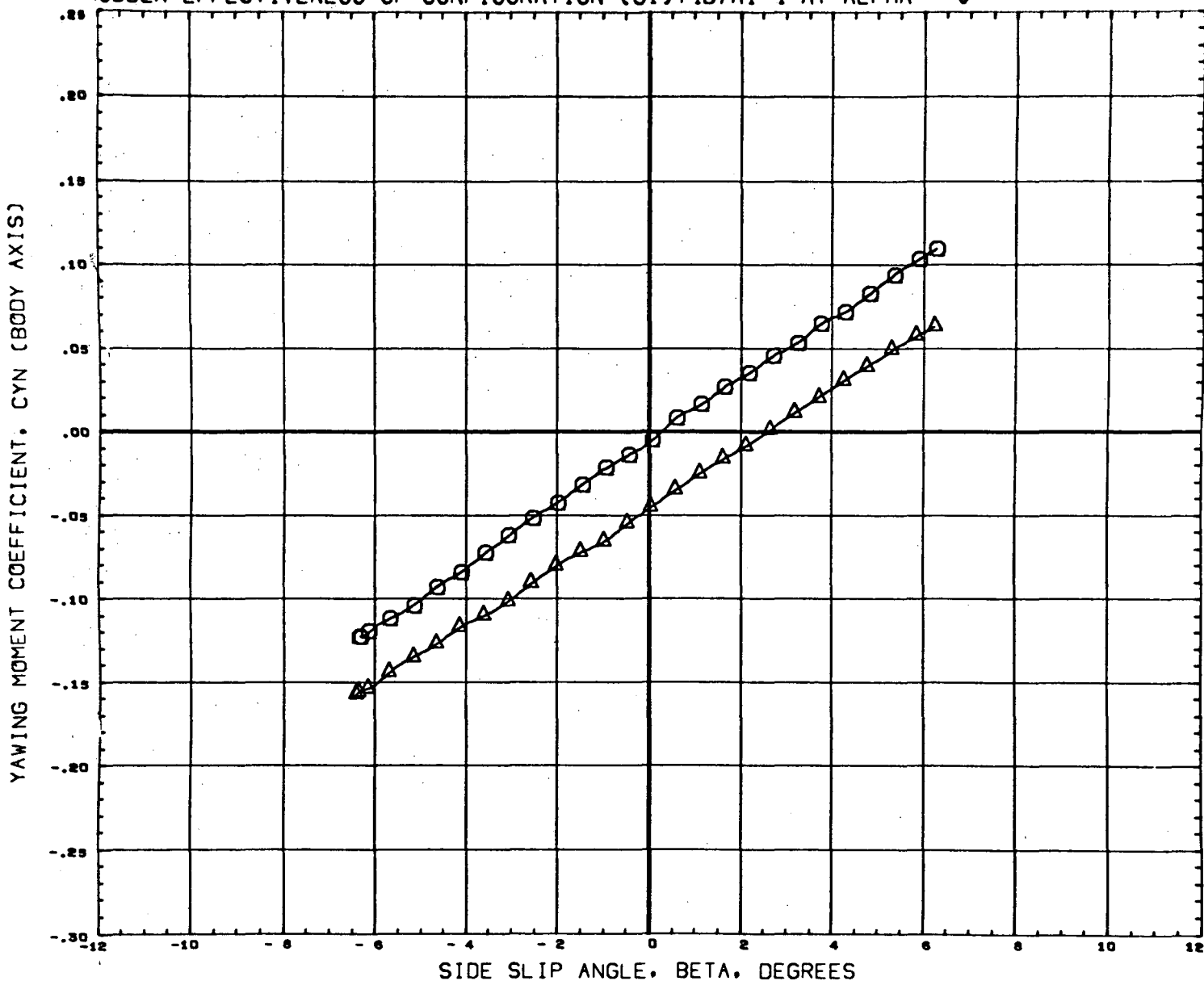
SIDE SLIP ANGLE, BETA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D5) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

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RUDDER EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

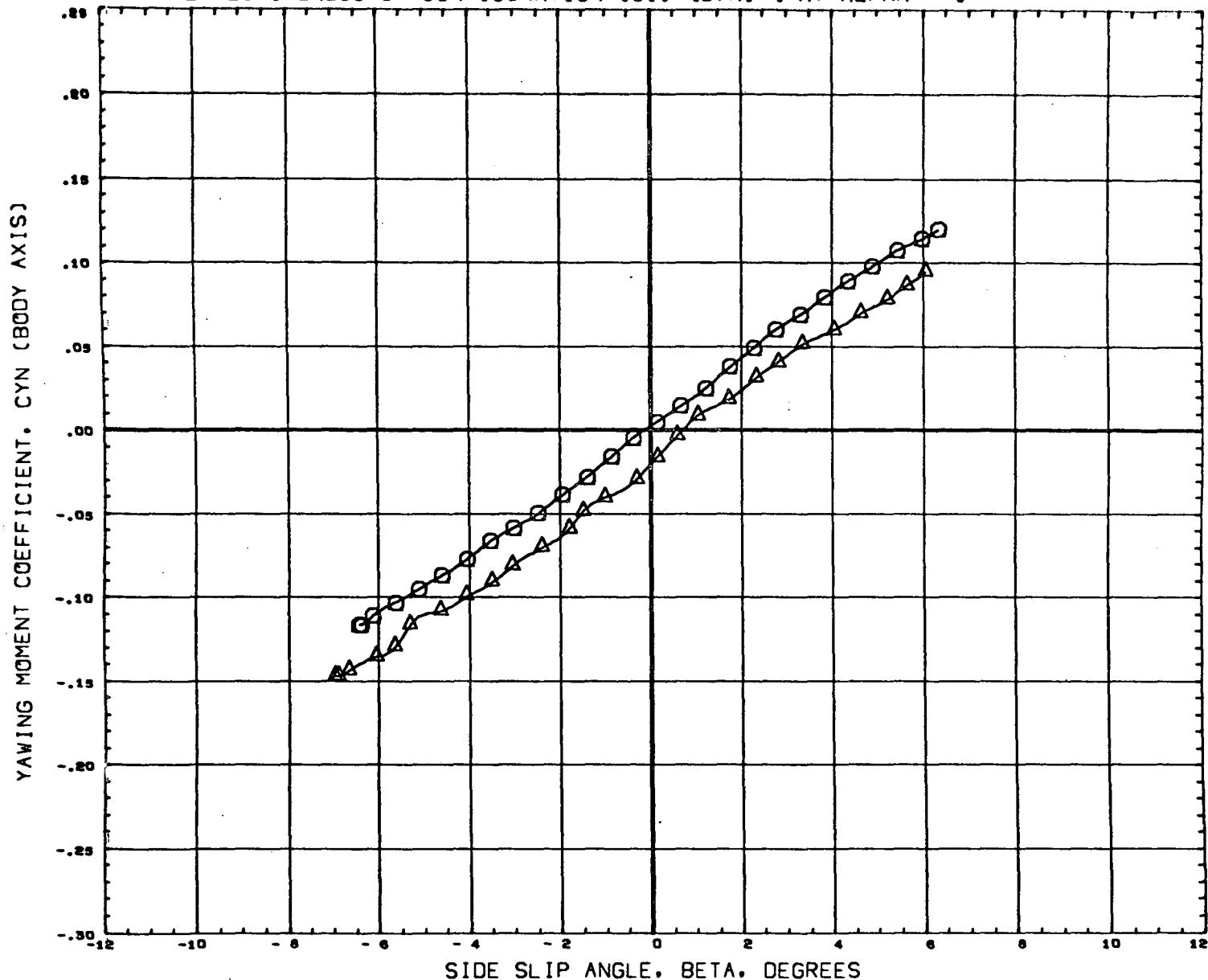


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D5) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.3004 IN. |
| | | | | | | BREF | 682.0004 IN. |
| | | | | | | XMRP | 957.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

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RUDDER EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

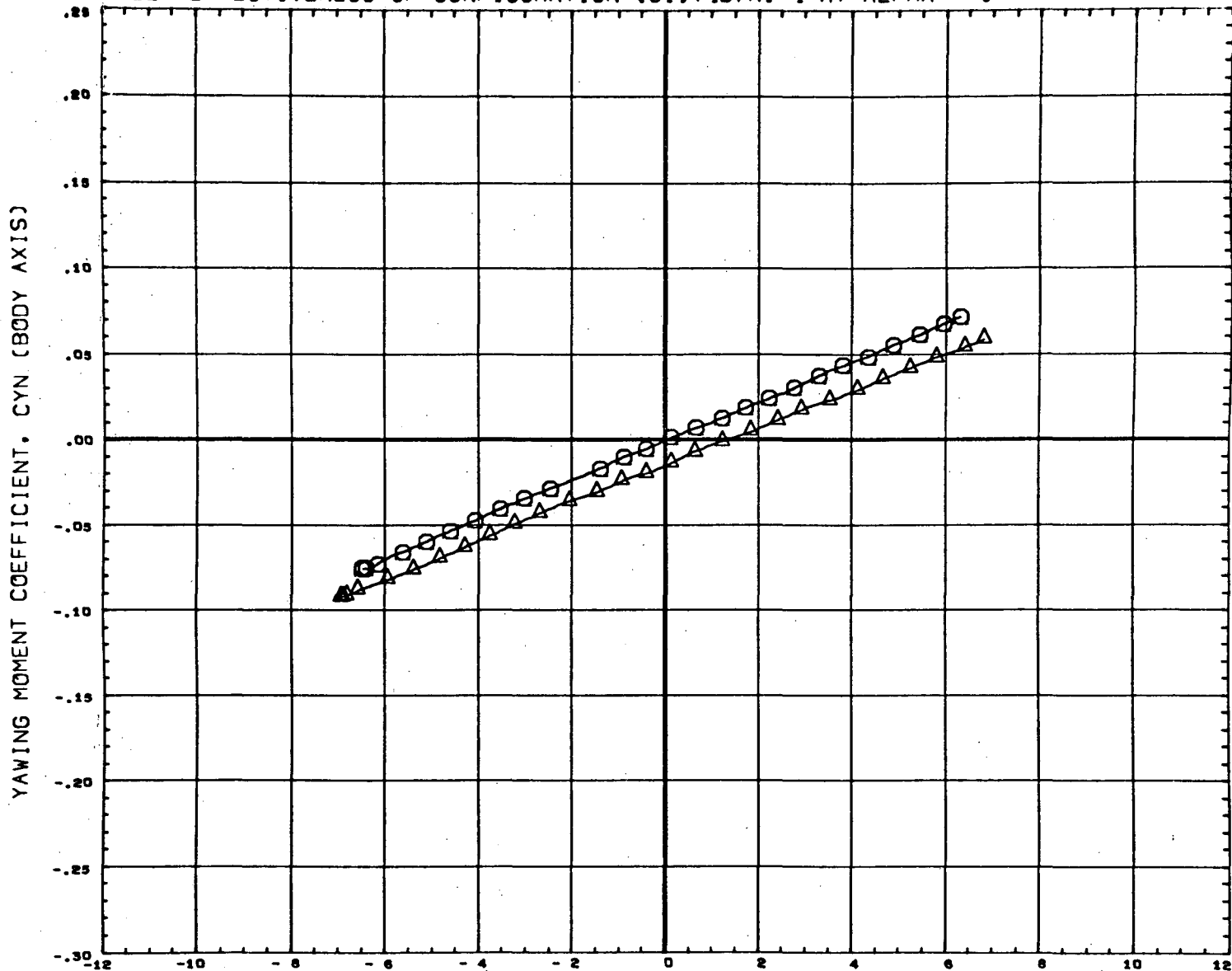


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | NDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D5) | NDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.51

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RUDDER EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C8) \bigcirc MDAC S-222 COMPOSITE(T-C6) (01)T4B7A1-4
(RD74D5) \triangle MDAC S-222 COMPOSITE(T-C6) (01)T4B7A1-4

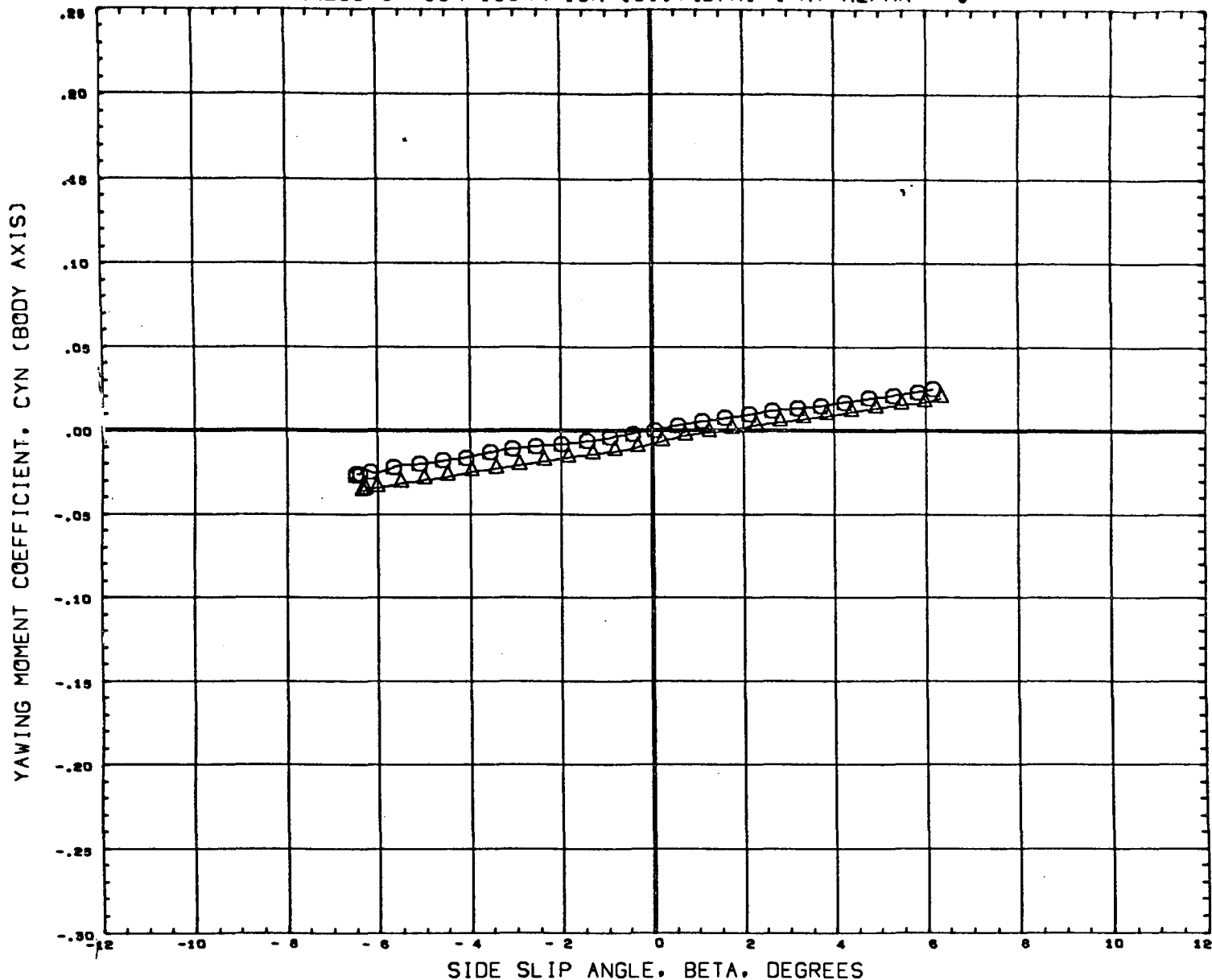
| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 10.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.3004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 2.20

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RUDDER EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C8) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
 (RD74D5) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 10.000 |

REFERENCE INFORMATION

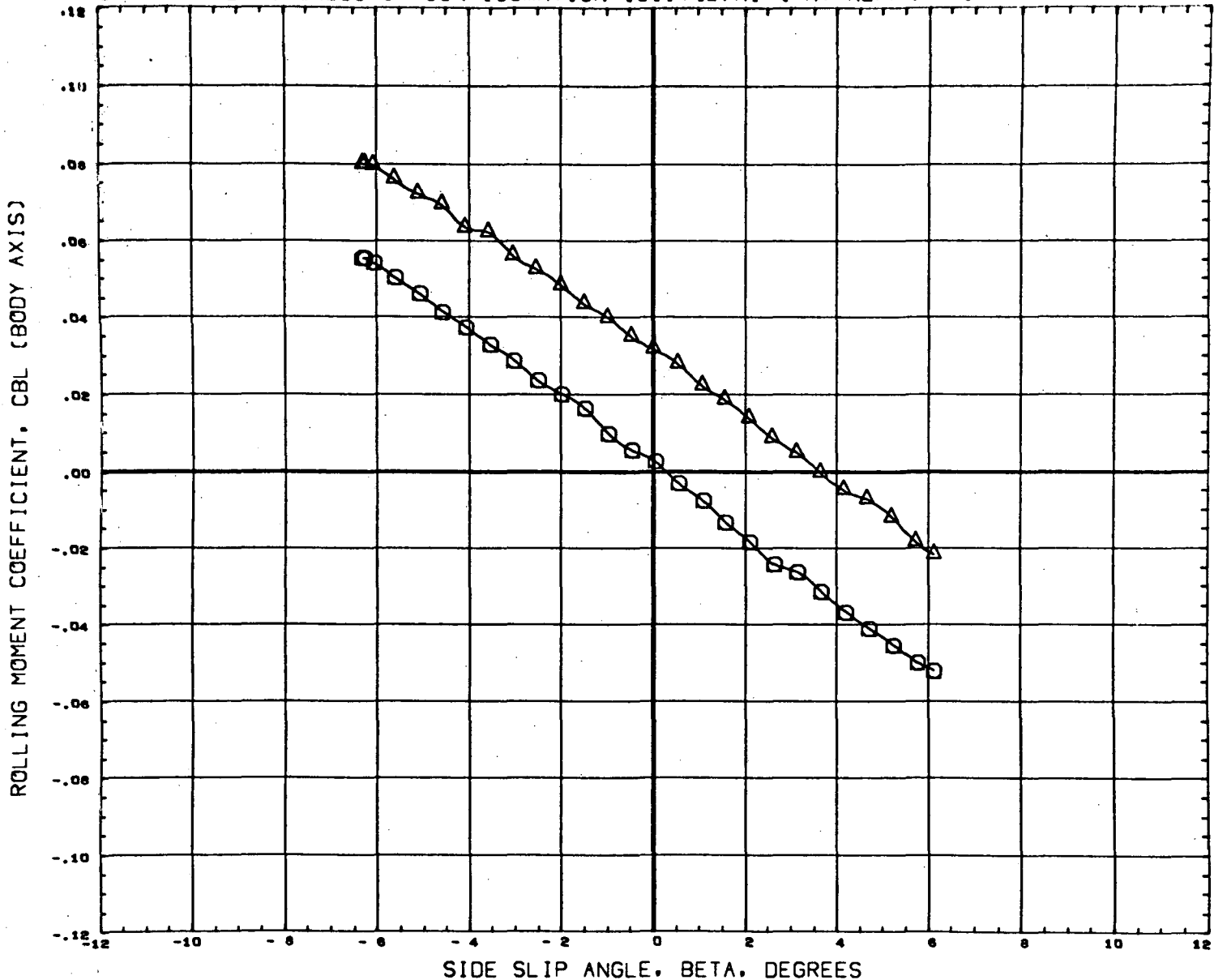
| | | |
|-------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH

4.47

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RUDDER EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

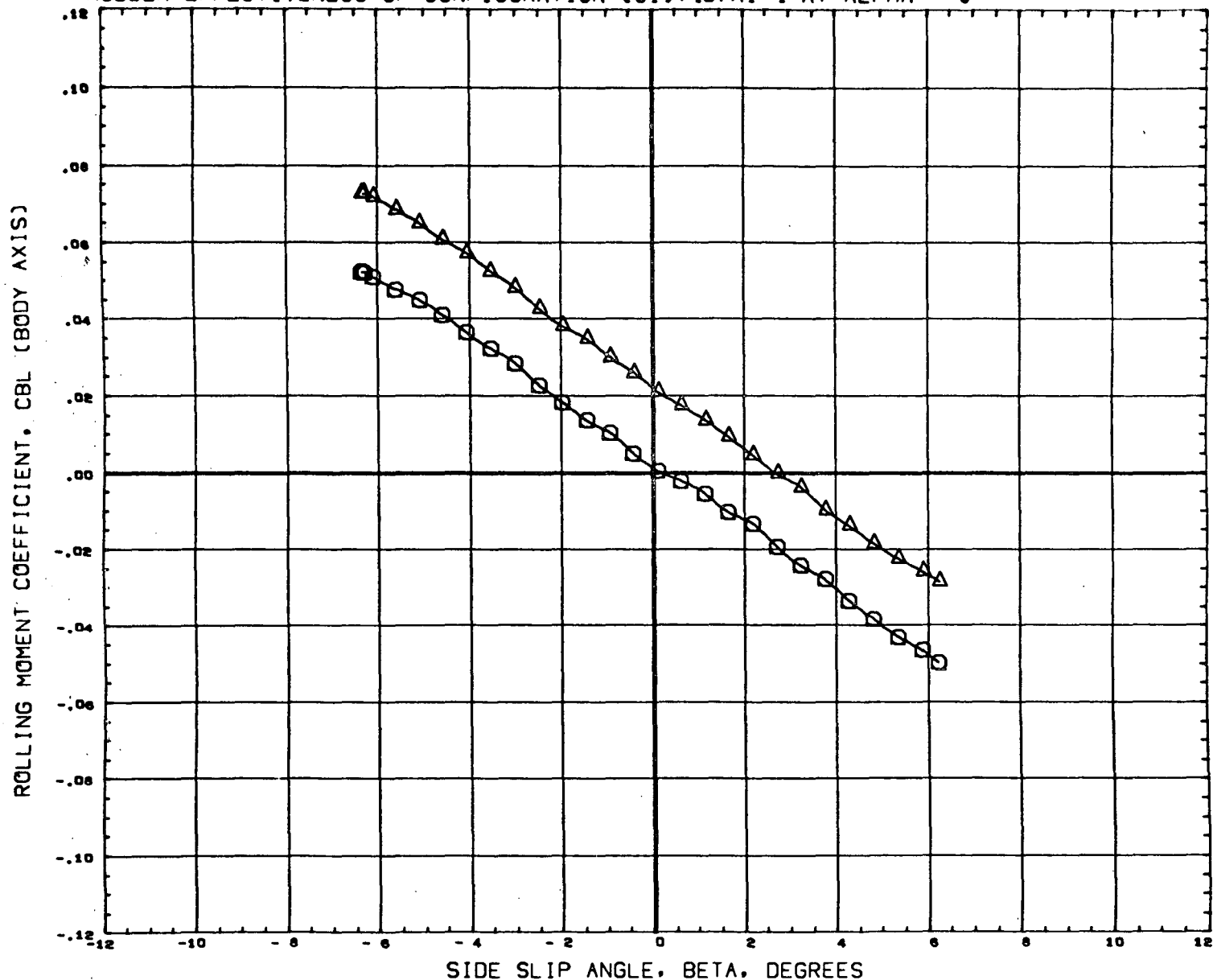


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | ATLRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D5) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

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RUDDER EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

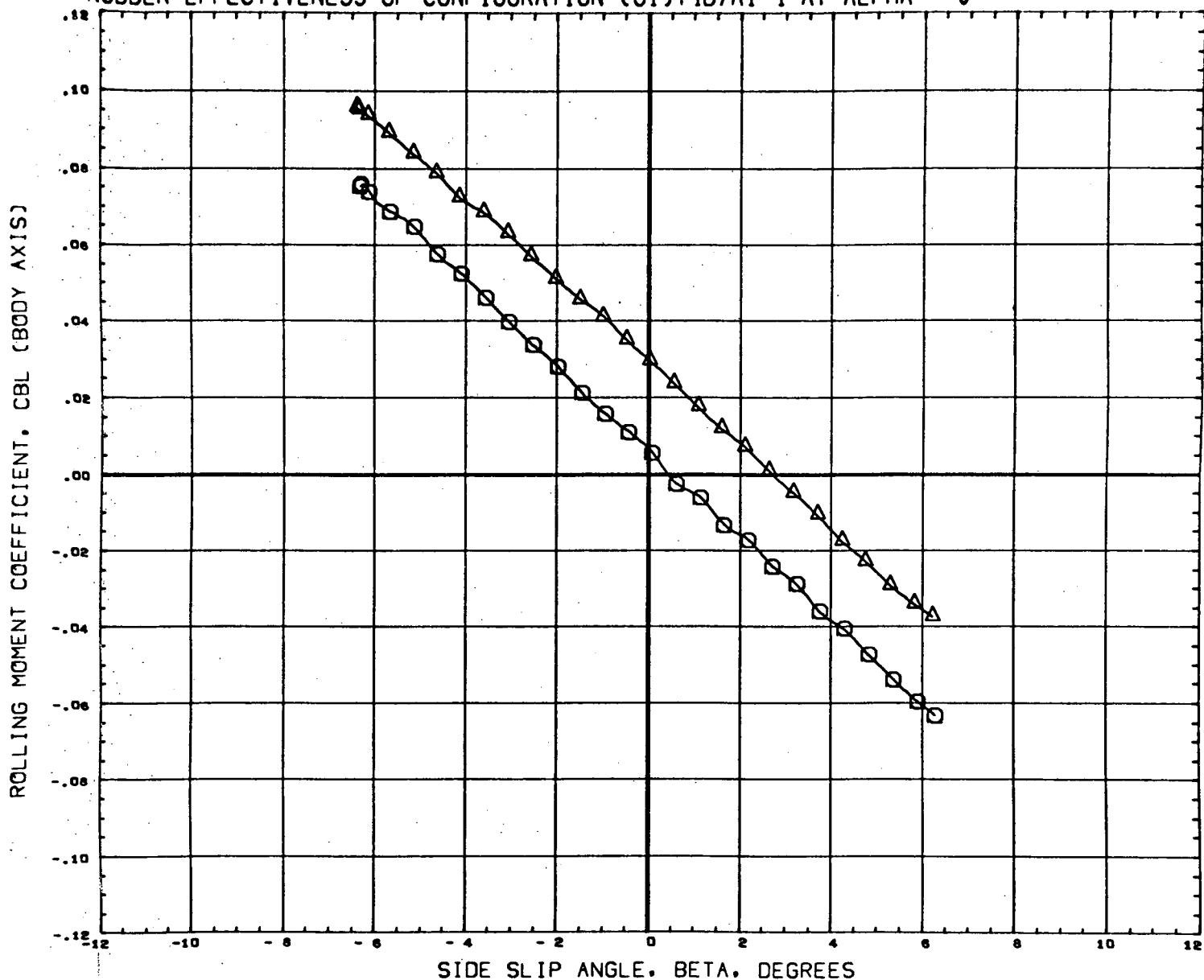


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D5) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

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RUDDER EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

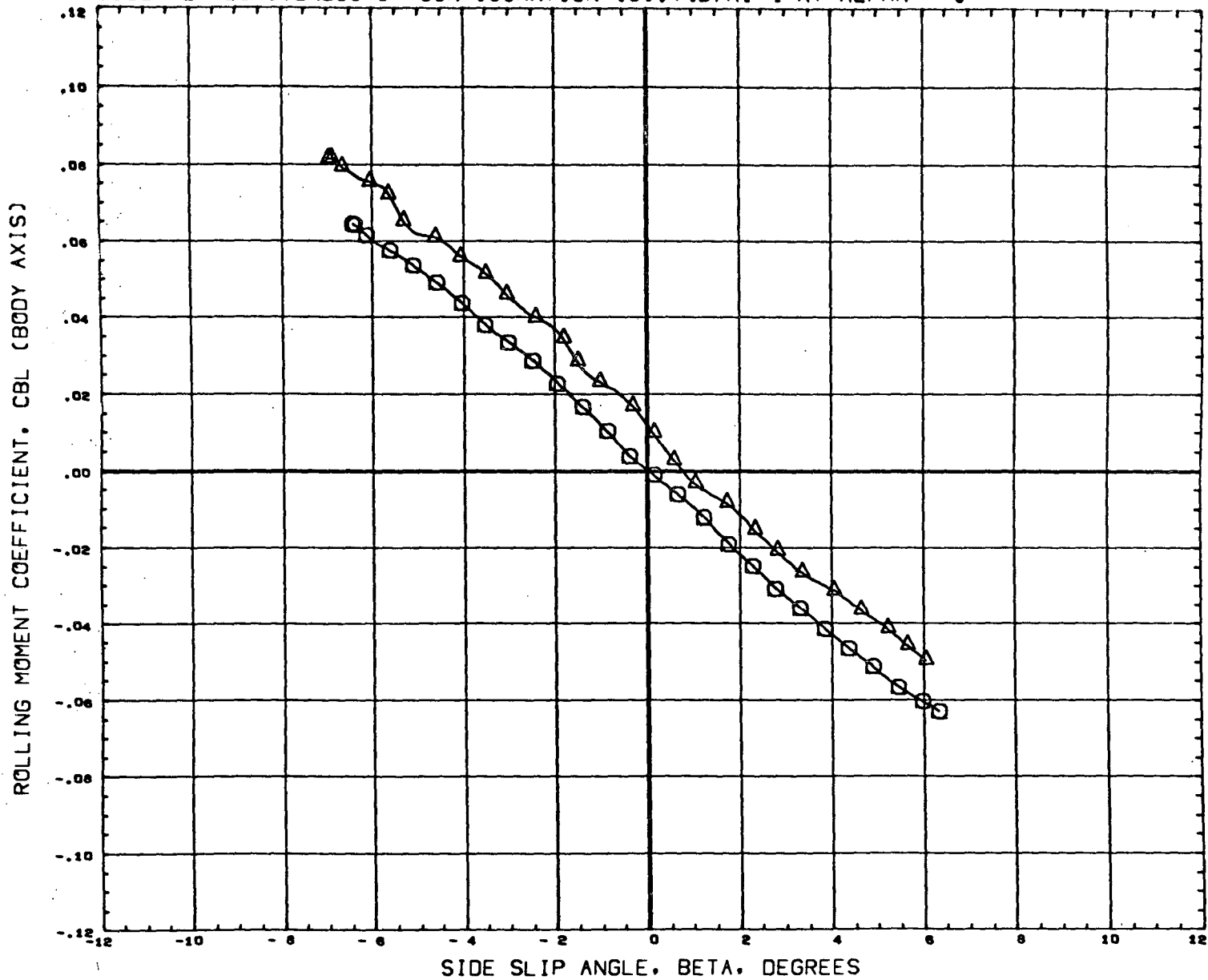


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D5) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

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RUDDER EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

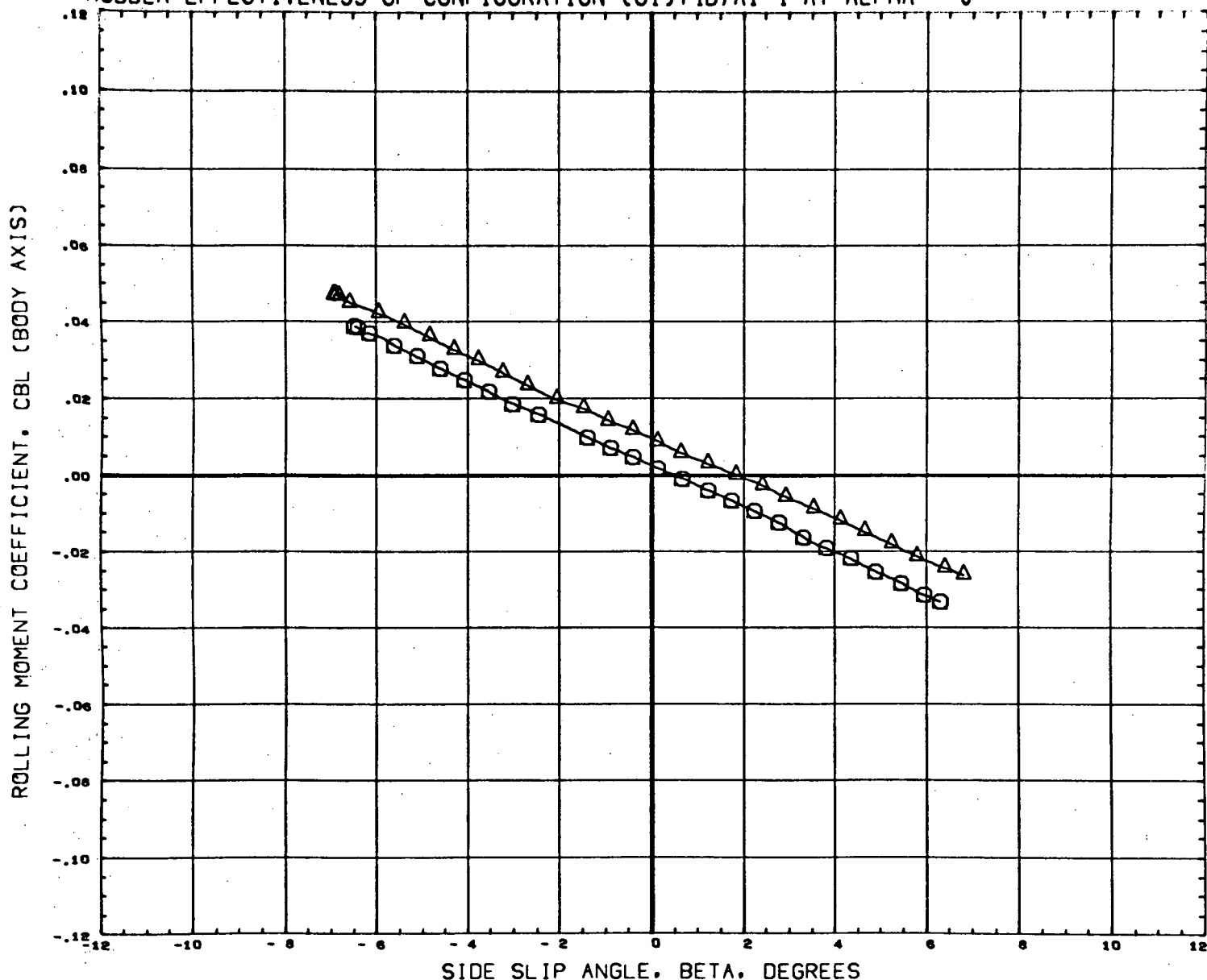


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D5) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.51

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RUDDER EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C8) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (RD74D5) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 10.000 |

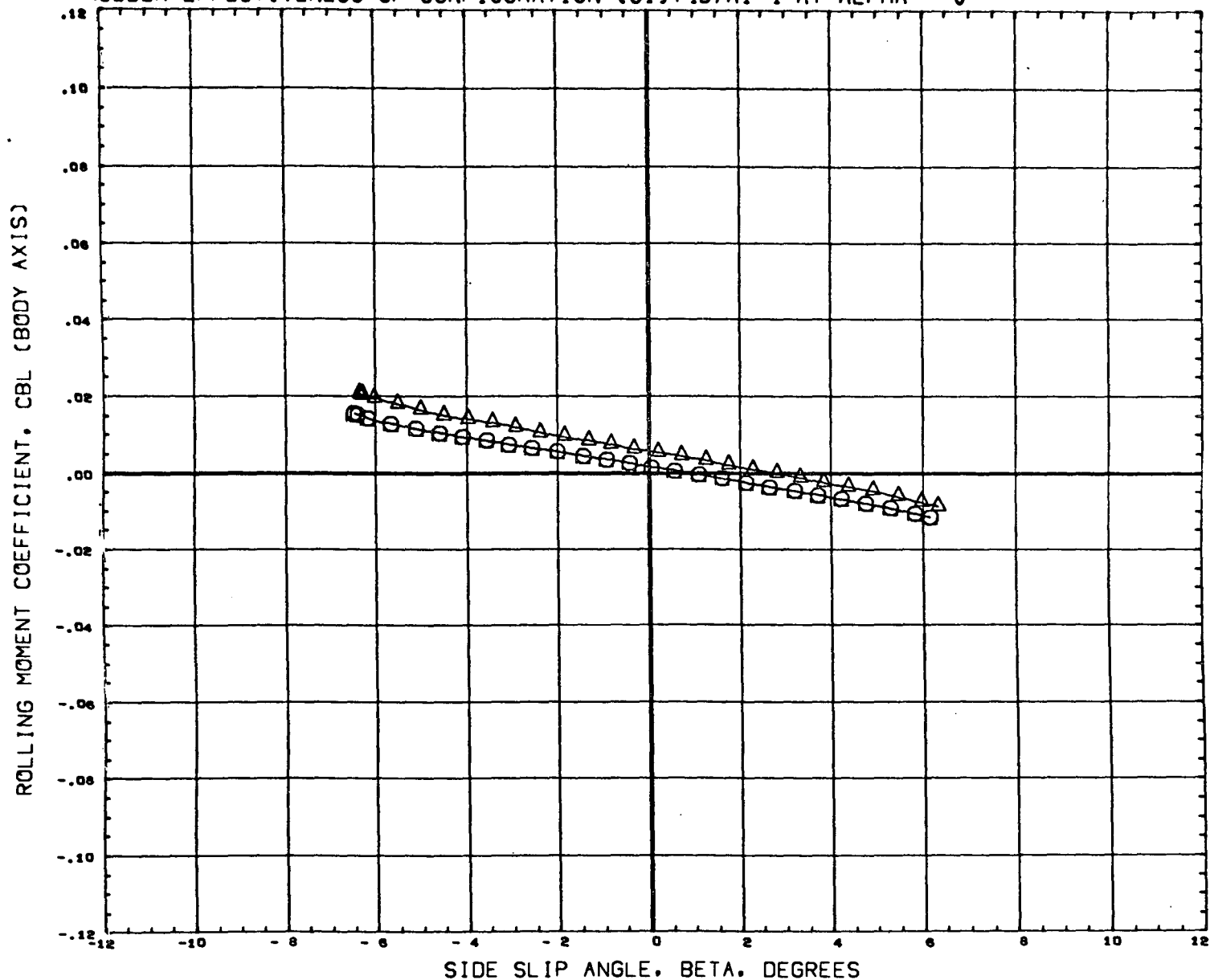
REFERENCE INFORMATION

| | | |
|-------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 2.20

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RUDDER EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

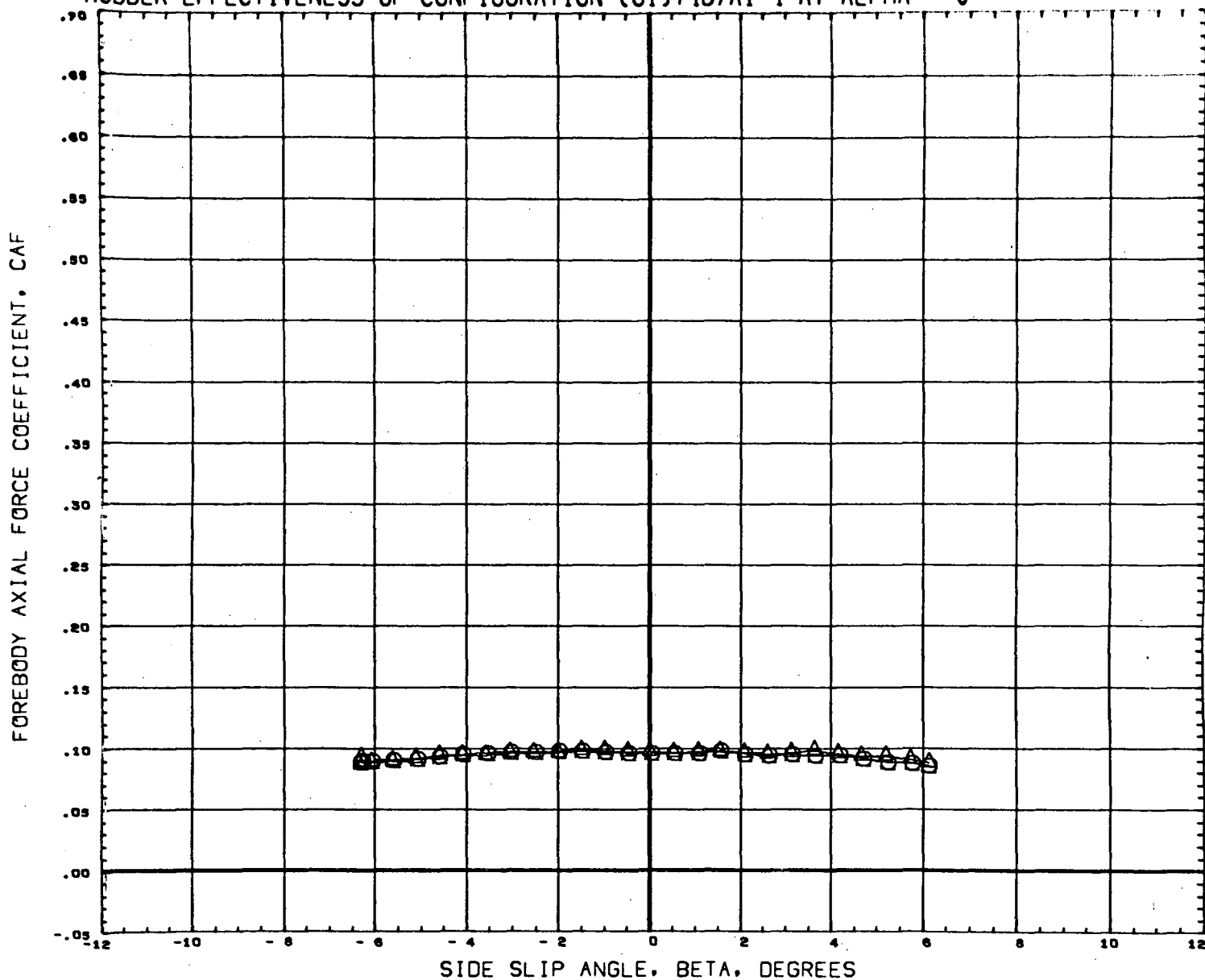


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D5) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |


MACH 4.47


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RUDDER EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C8)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

(RD74D5)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

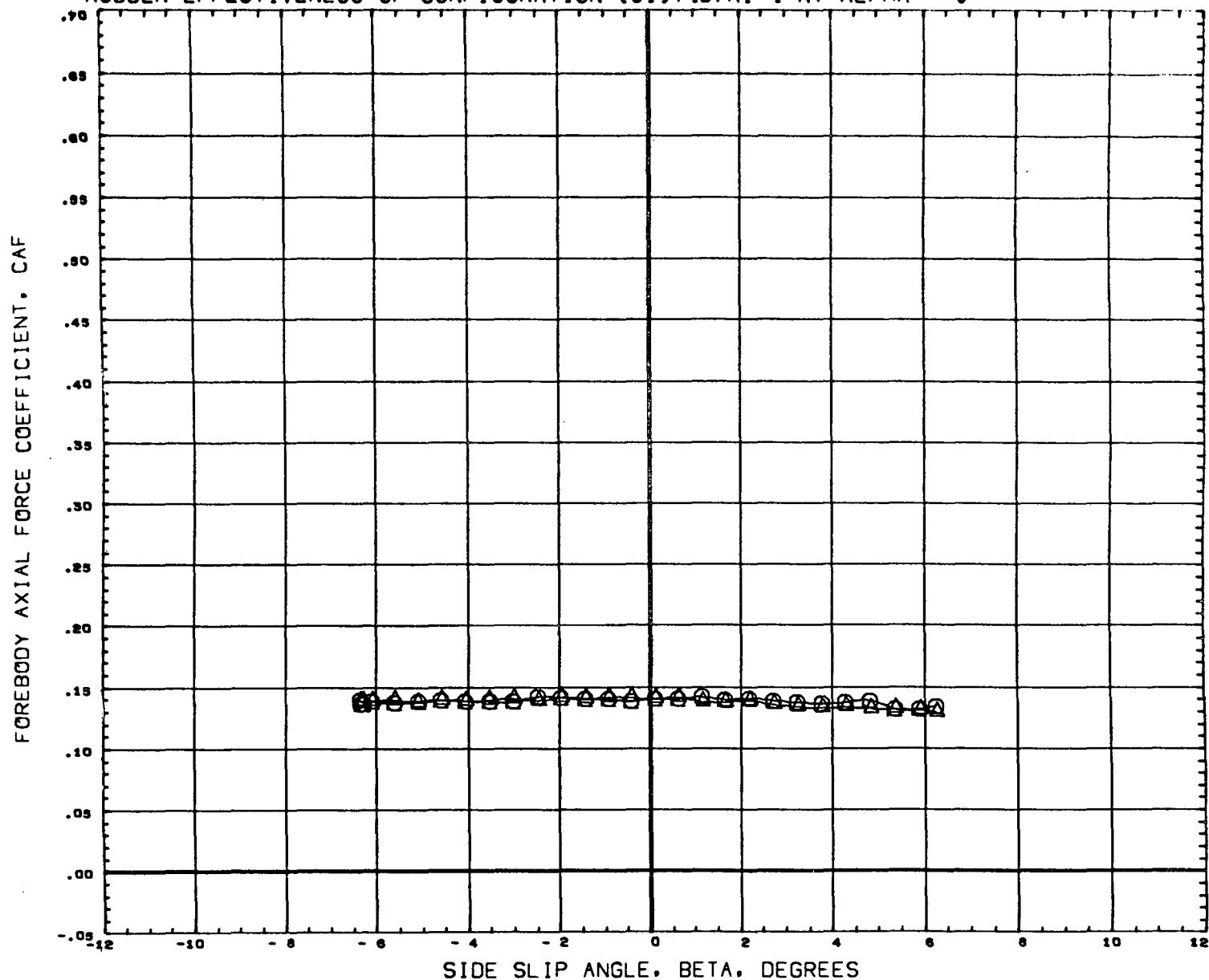
| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 10.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

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RUDDER EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (TD74C8) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (RD74D5) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

ALPHA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 10.000

REFERENCE INFORMATION
 SREF 3135.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

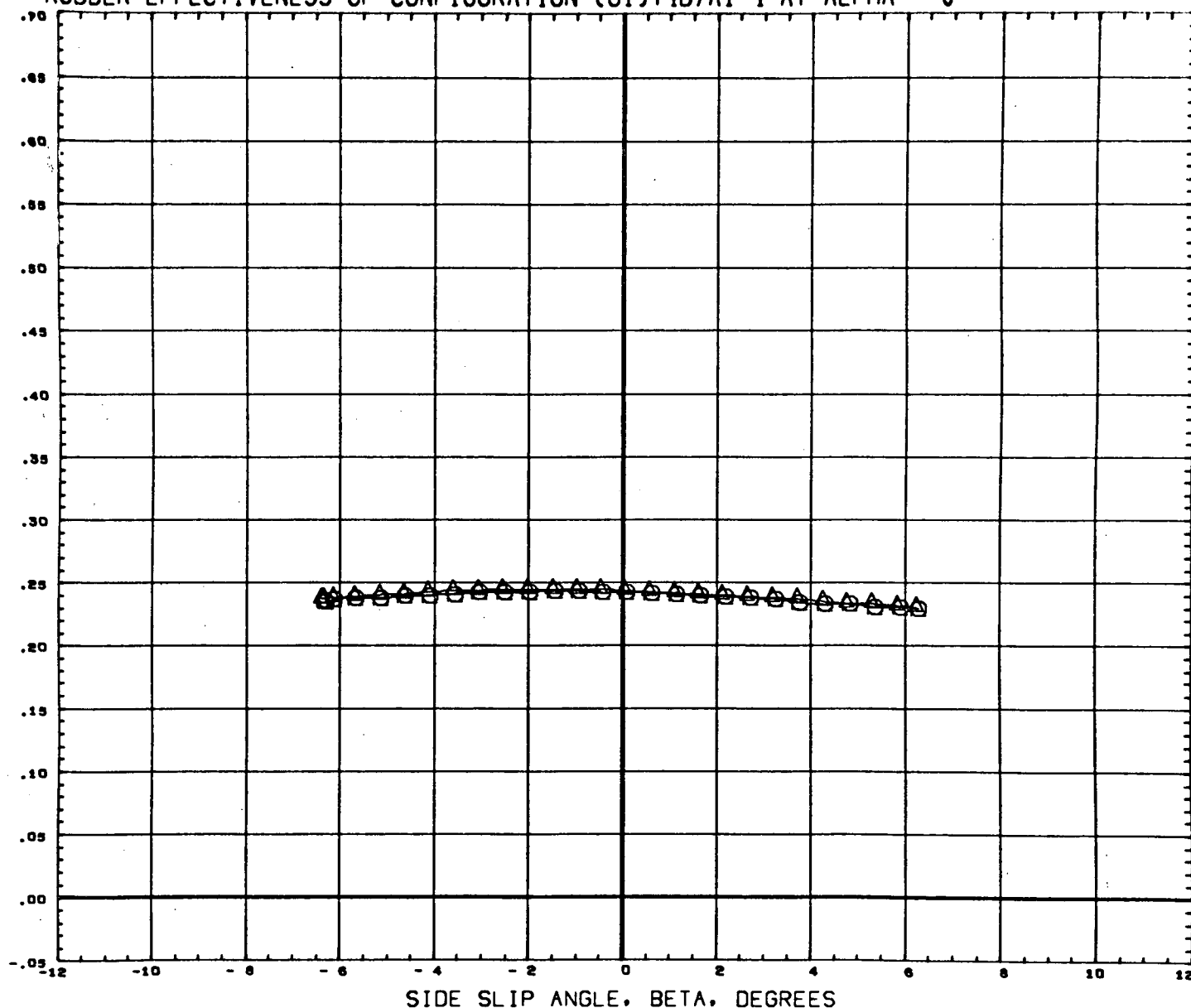
MACH



.90

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RUDDER EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (TD74C8)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (RD74D5)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

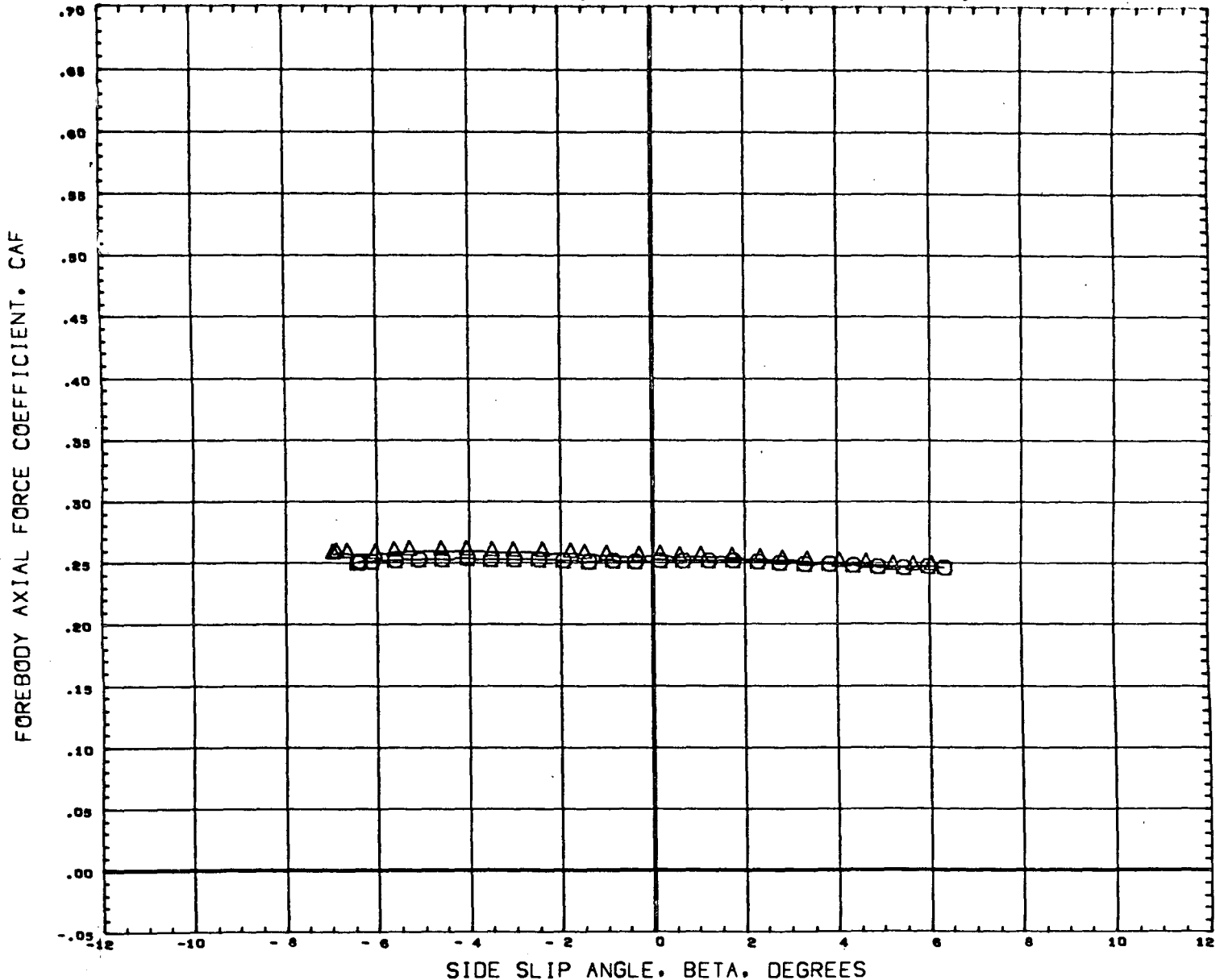
| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 10.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 1.08

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RUDDER EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

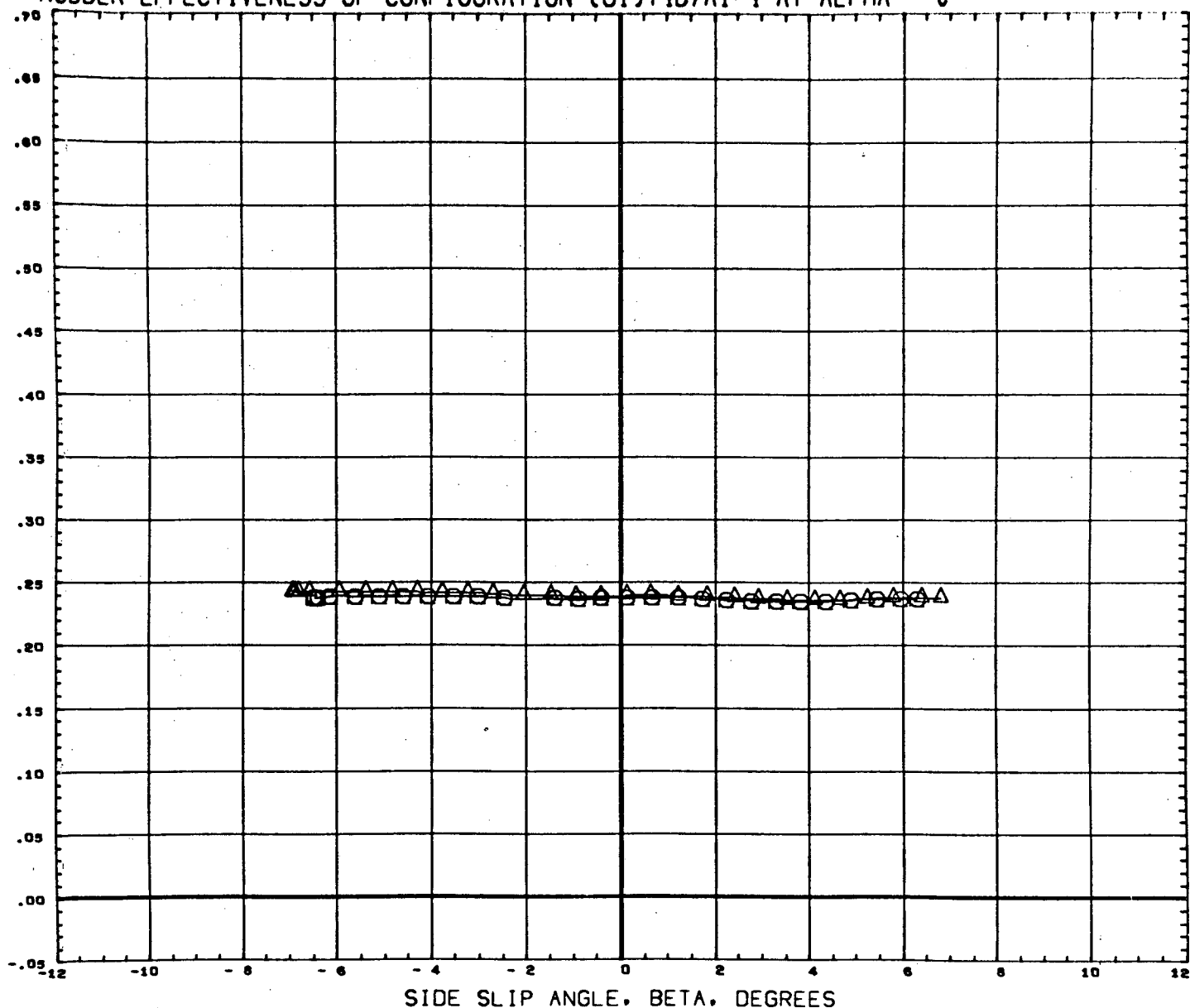


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D5) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.51

PAGE 252

RUDDER EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (TD74C8) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (RD74D5) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

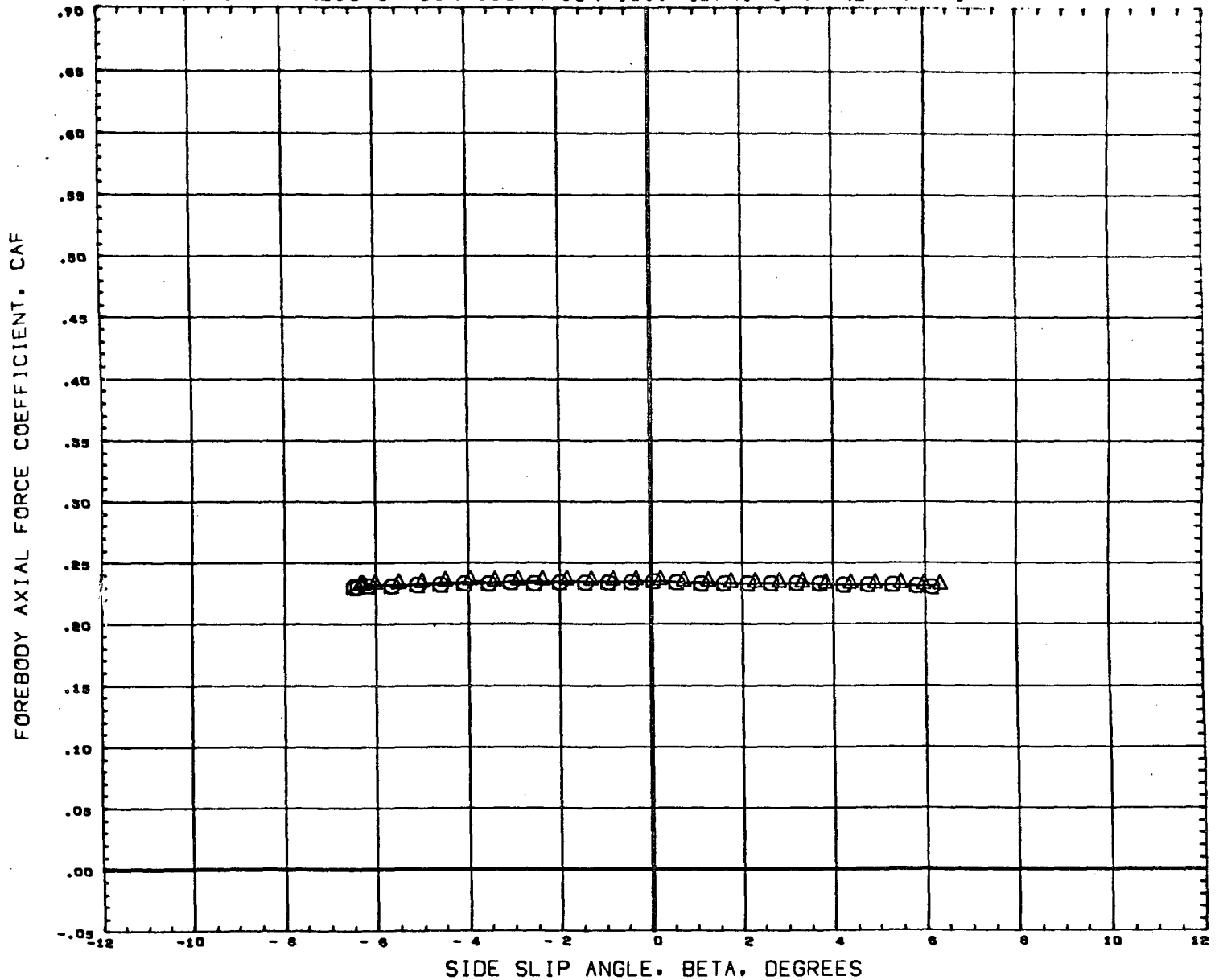
| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 10.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 2.20

PAGE 253

RUDDER EFFECTIVENESS OF CONFIGURATION (01)T4B7A1-4 AT ALPHA = 0

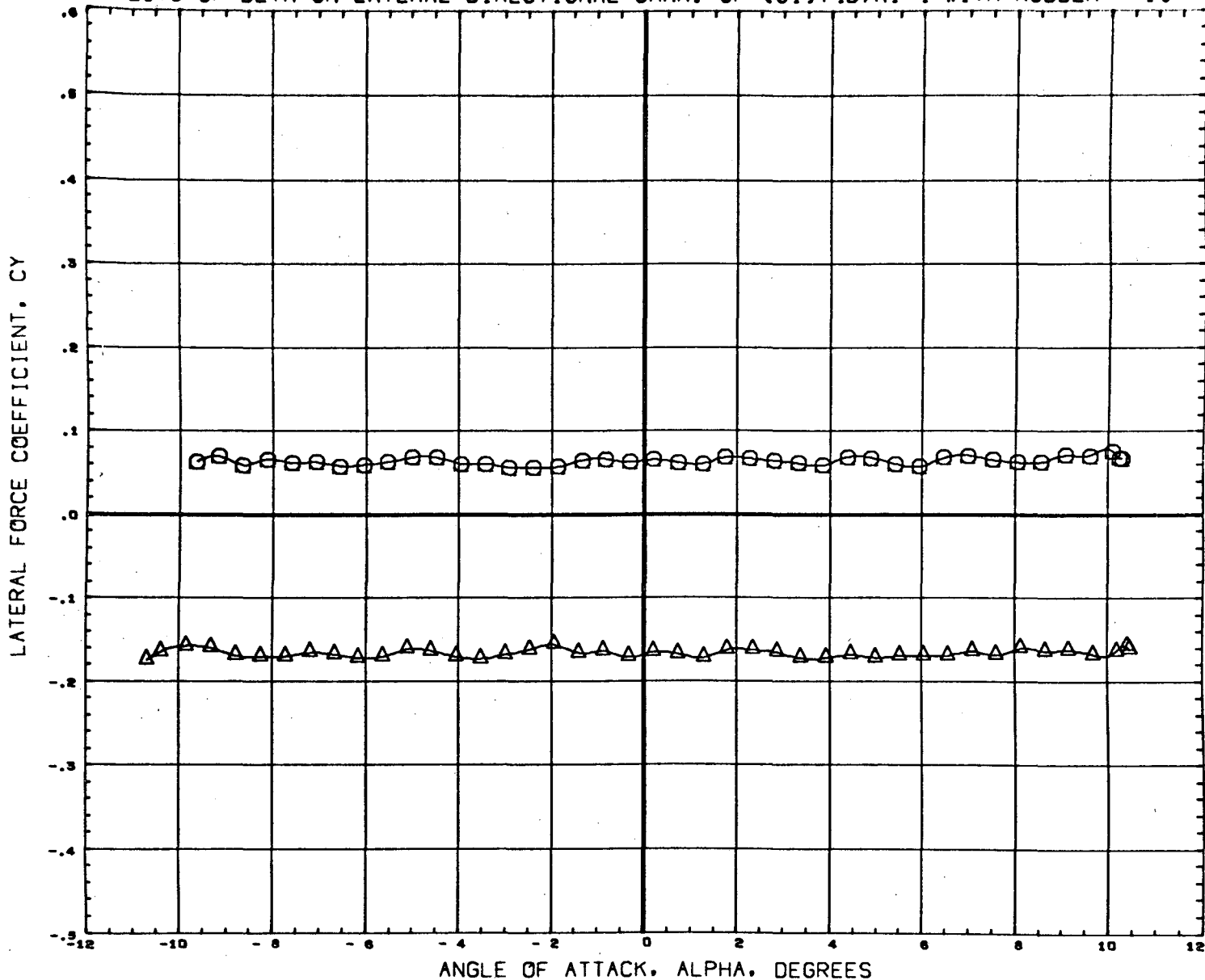


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-----------------|---|-------|--------|--------|--------|-----------------------|-----------|--------|
| (T074C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| (R074D5) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 | IN. |
| | | | | | | BREF | 882.0004 | IN. |
| | | | | | | XMRP | 557.0004 | IN. |
| | | | | | | YMRP | 0.0000 | IN. |
| | | | | | | ZMRP | 200.0004 | IN. |
| | | | | | | SCALE | 0.0060 | SCALE |

MACH 4.47

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHAR. OF (01)T4B7A1-4 WITH RUDDER = 10



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(RD74D4) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
 (TD74D6) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 10.000 |
| 6.000 | 0.000 | 0.000 | 10.000 |

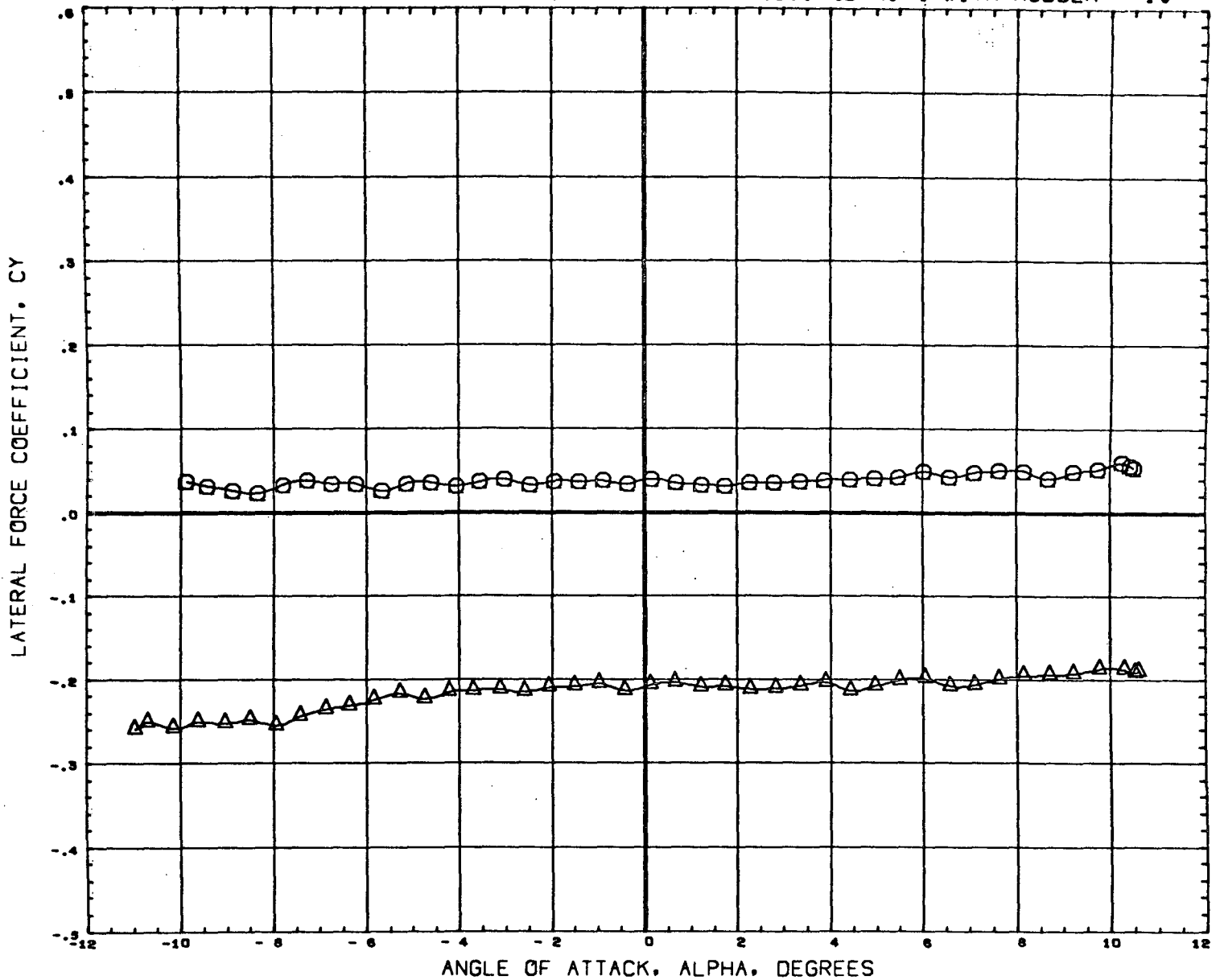
REFERENCE INFORMATION

| | | |
|-------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 537.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH .58

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHAR. OF (01)T4B7A1-4 WITH RUDDER = 10

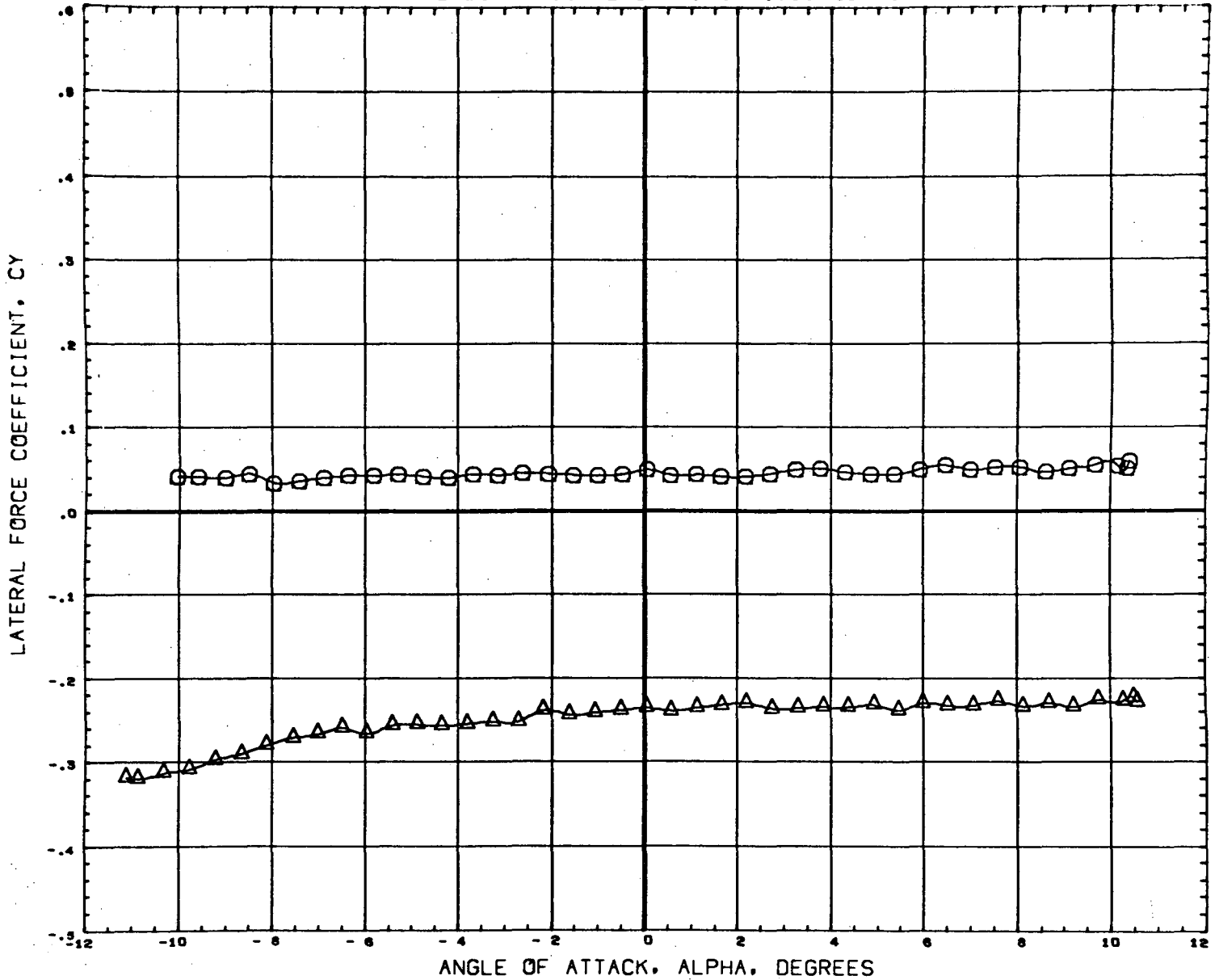


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD7404) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | SREF | 3155.3040 SQ.FT. |
| (TD7406) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | YMRP | 557.0004 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .89

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHAR. OF (01)T4B7A1-4 WITH RUDDER = 10



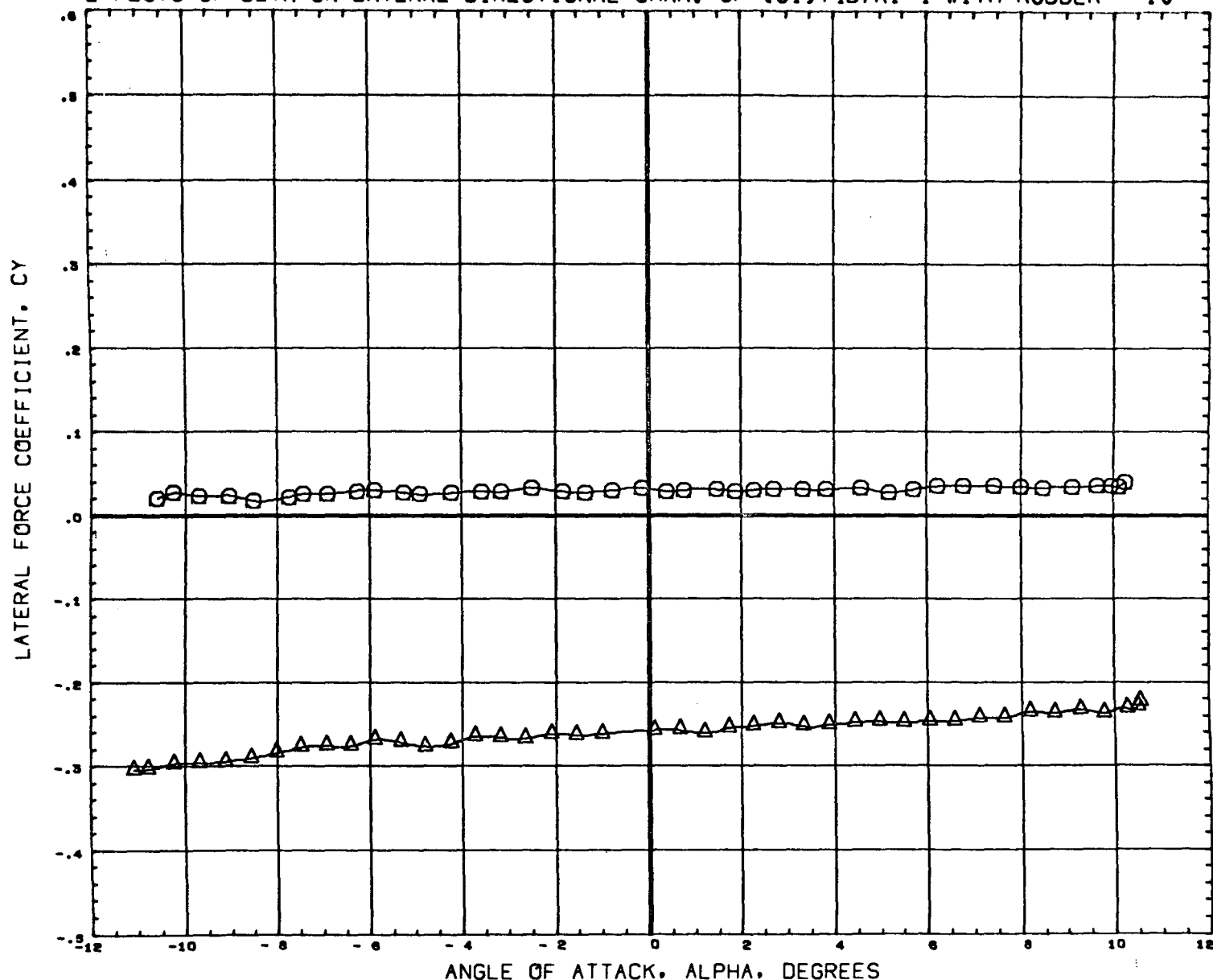
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (RD7404) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (TD7406) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 0.000 | 0.000 | 0.000 | 10.000 | SREF 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 10.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH 1.09

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHAR. OF (O1)T4B7A1-4 WITH RUDDER = 10

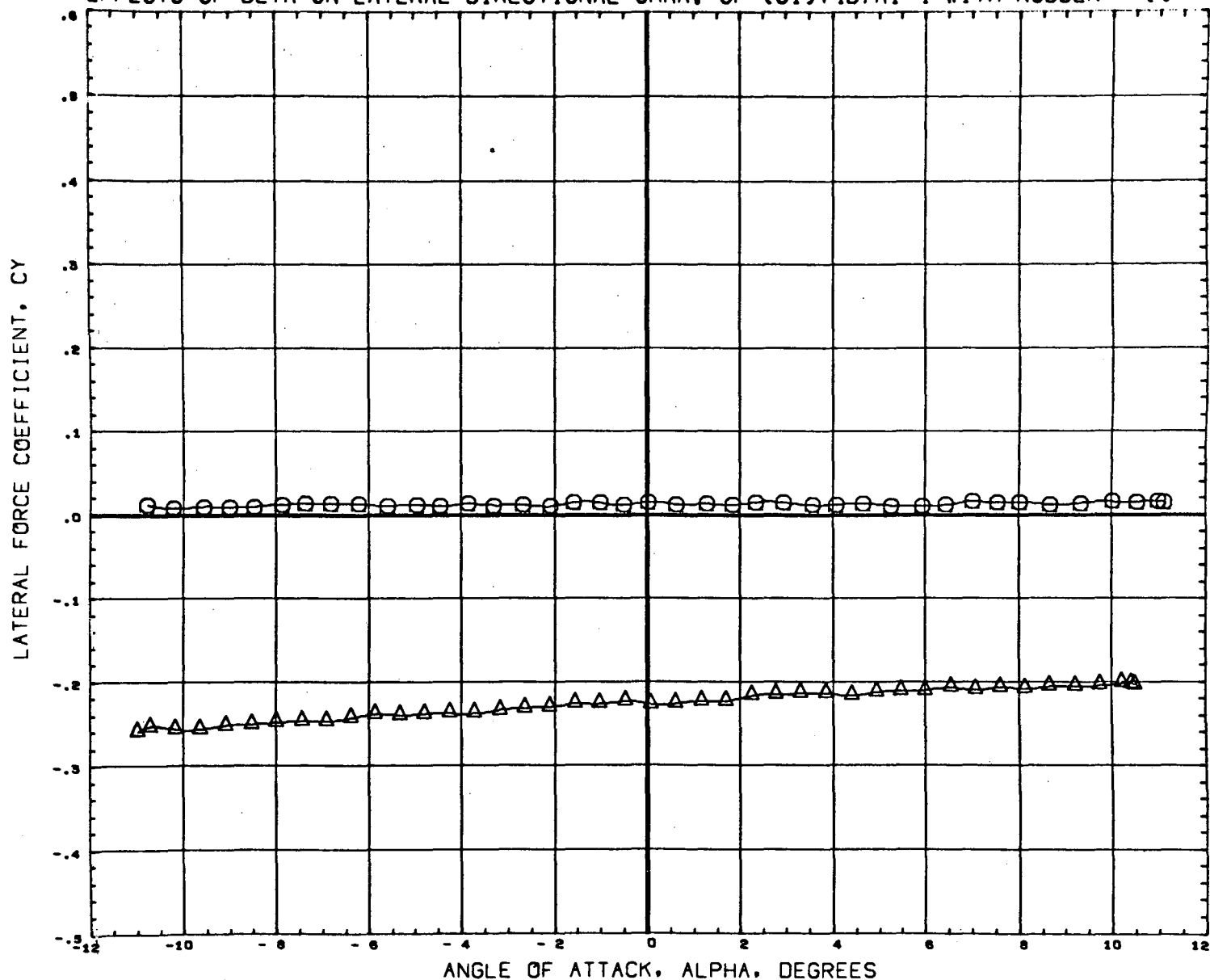


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74D4) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | SREF | 3155.3040 SQ.FT. |
| (TD74D6) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.51

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHAR. OF (01)T4B7A1-4 WITH RUDDER = 10



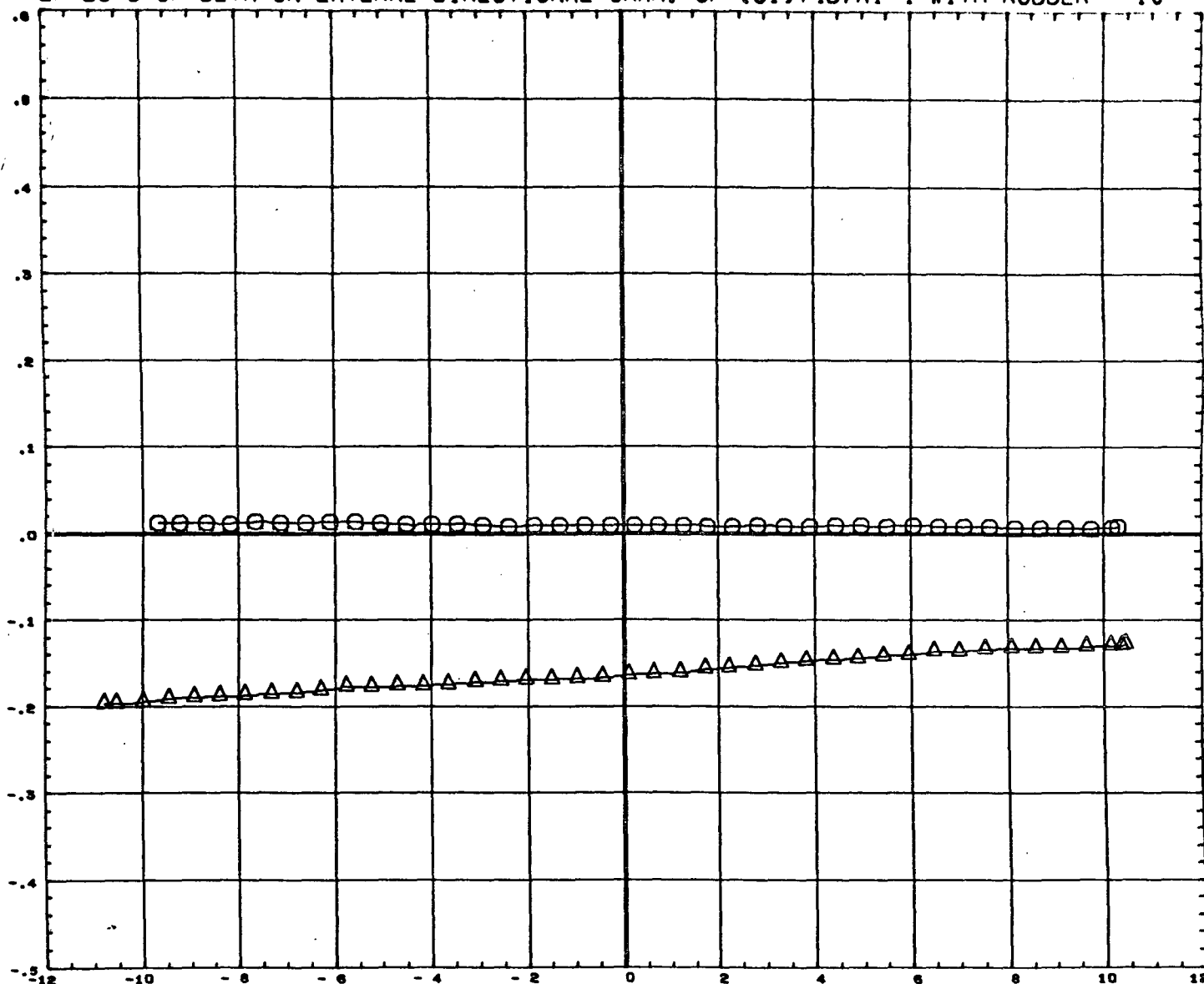
| DATA SET | SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|----------|--------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74D4) | ○ | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | SREF | 3155.3040 SQ.FT. |
| (TD74D6) | △ | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | | BREF | 882.0004 IN. |
| | | | | | | | XMRP | 557.0004 IN. |
| | | | | | | | YMRP | 0.0000 IN. |
| | | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHAR. OF (01)T487A1-4 WITH RUDDER = 10

LATERAL FORCE COEFFICIENT, CY



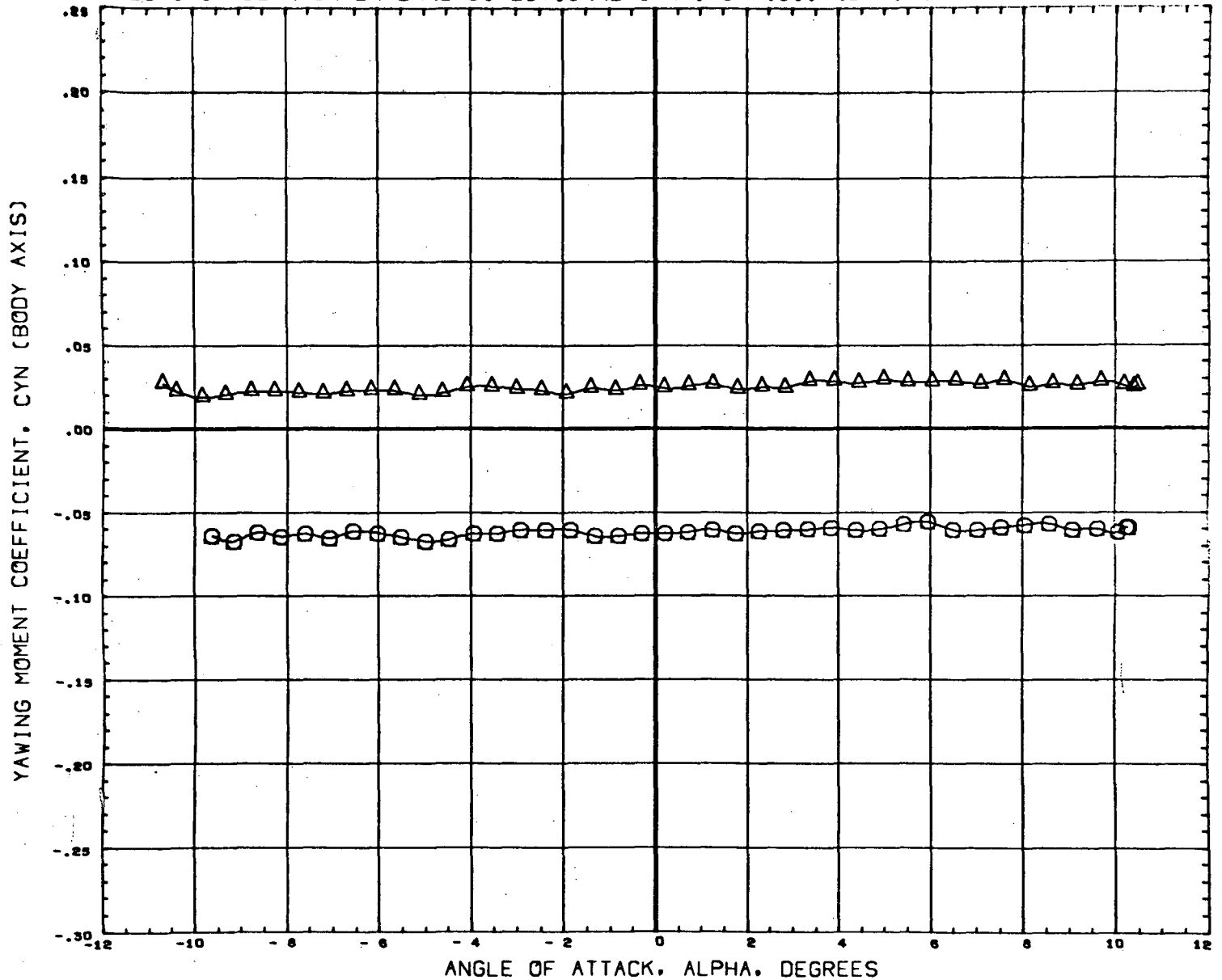
ANGLE OF ATTACK, ALPHA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74D4) | MDAC S-222 COMPOSITE (T-CG) (01)T487A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | SREF | 3155.3040 SQ.FT. |
| (TD74D6) | MDAC S-222 COMPOSITE (T-CG) (01)T487A1-4 | 6.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRF | 557.0004 IN. |
| | | | | | | YMRF | 0.0000 IN. |
| | | | | | | ZMRF | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHAR. OF (O1)T4B7A1-4 WITH RUDDER = 10



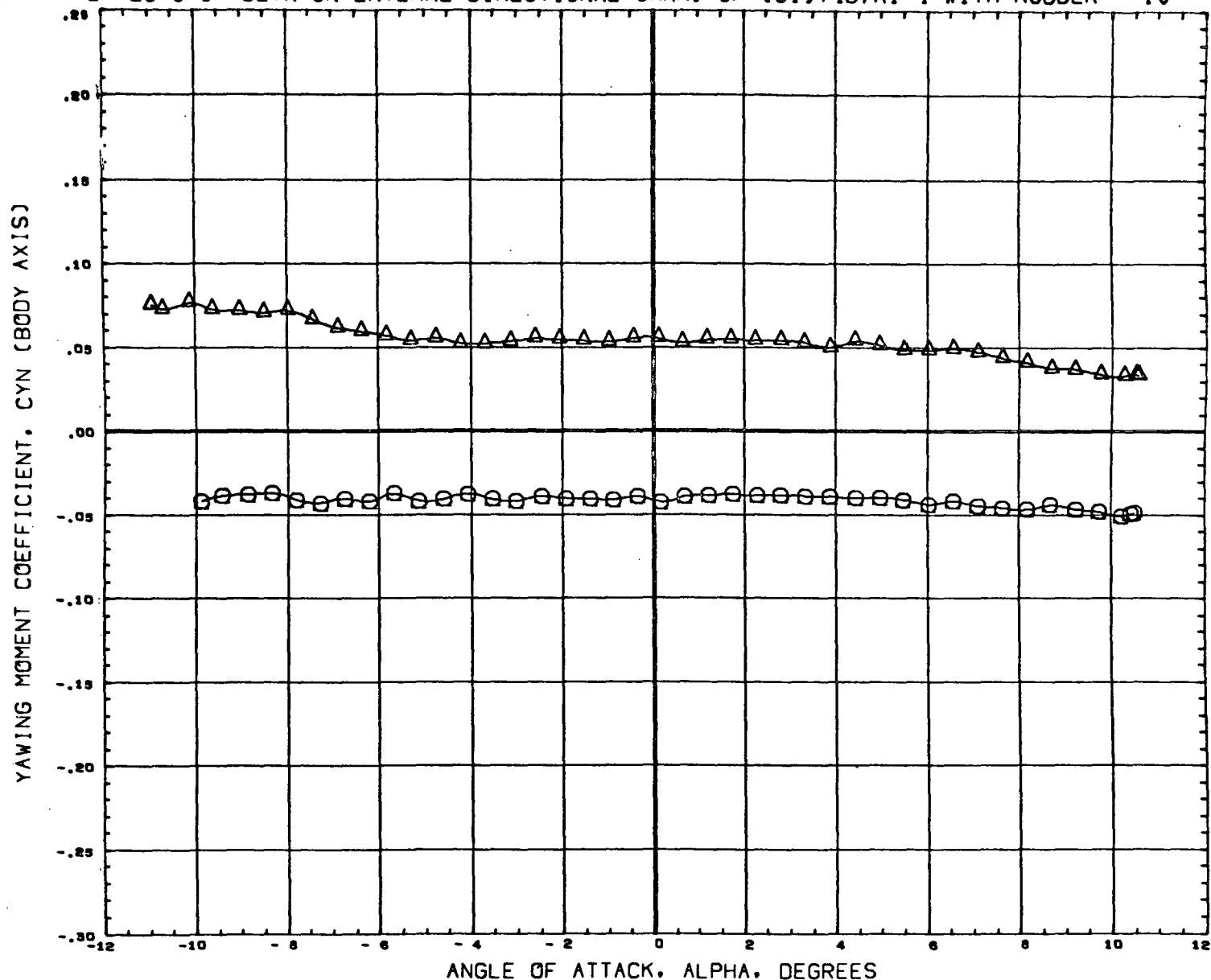
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (RD7404) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 |
| (TD7406) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 0.000 | 0.000 | 0.000 | 10.000 | SREF 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 10.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH .58

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHAR. OF (01)T4B7A1-4 WITH RUDDER = 10

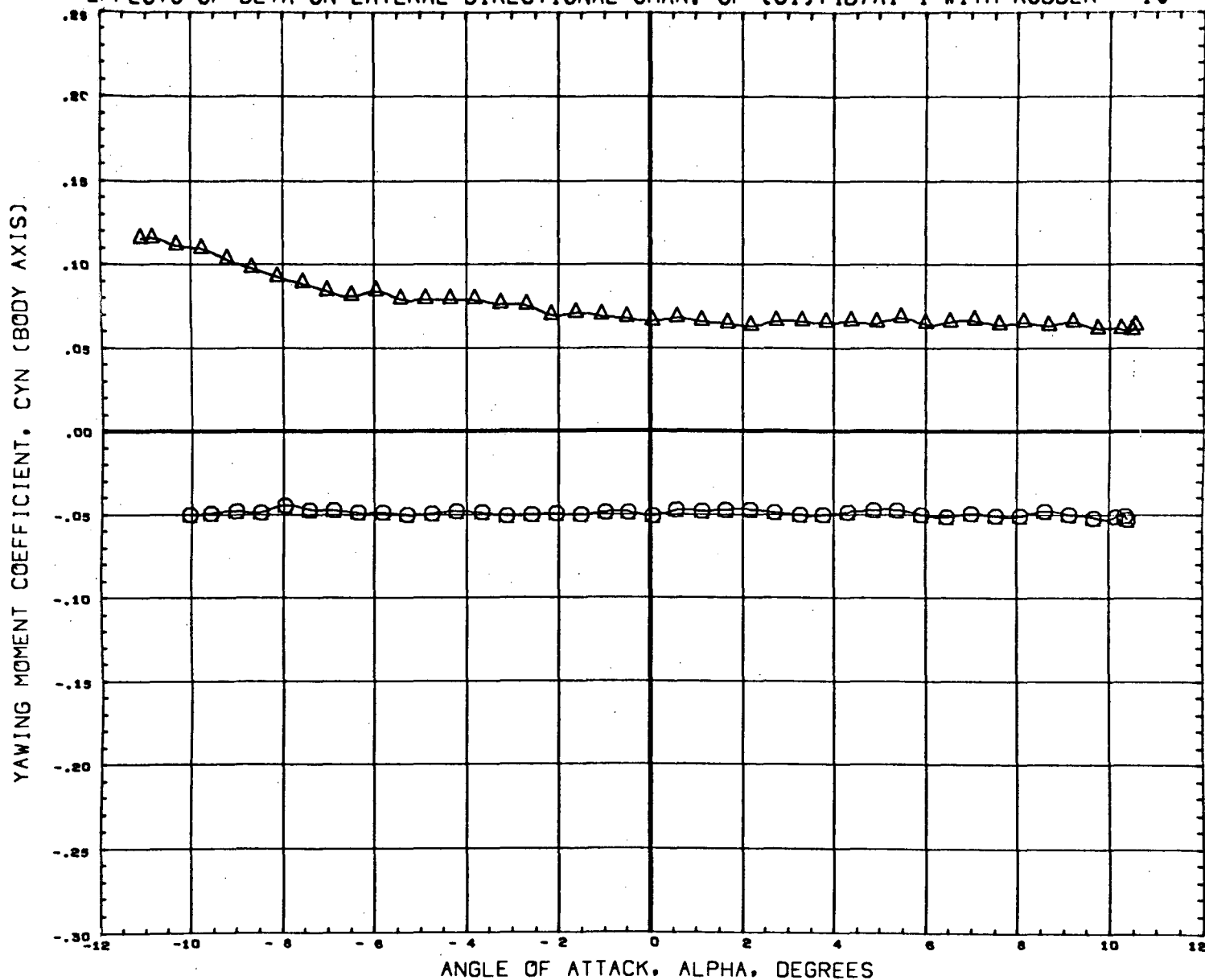


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74D4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | SREF | 3155.3040 SQ.FT. |
| (TD74D6) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .89

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHAR. OF (01)T4B7A1-4 WITH RUDDER = 10



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(RD74D4) (01)T4B7A1-4
 (TD74D6) (01)T4B7A1-4

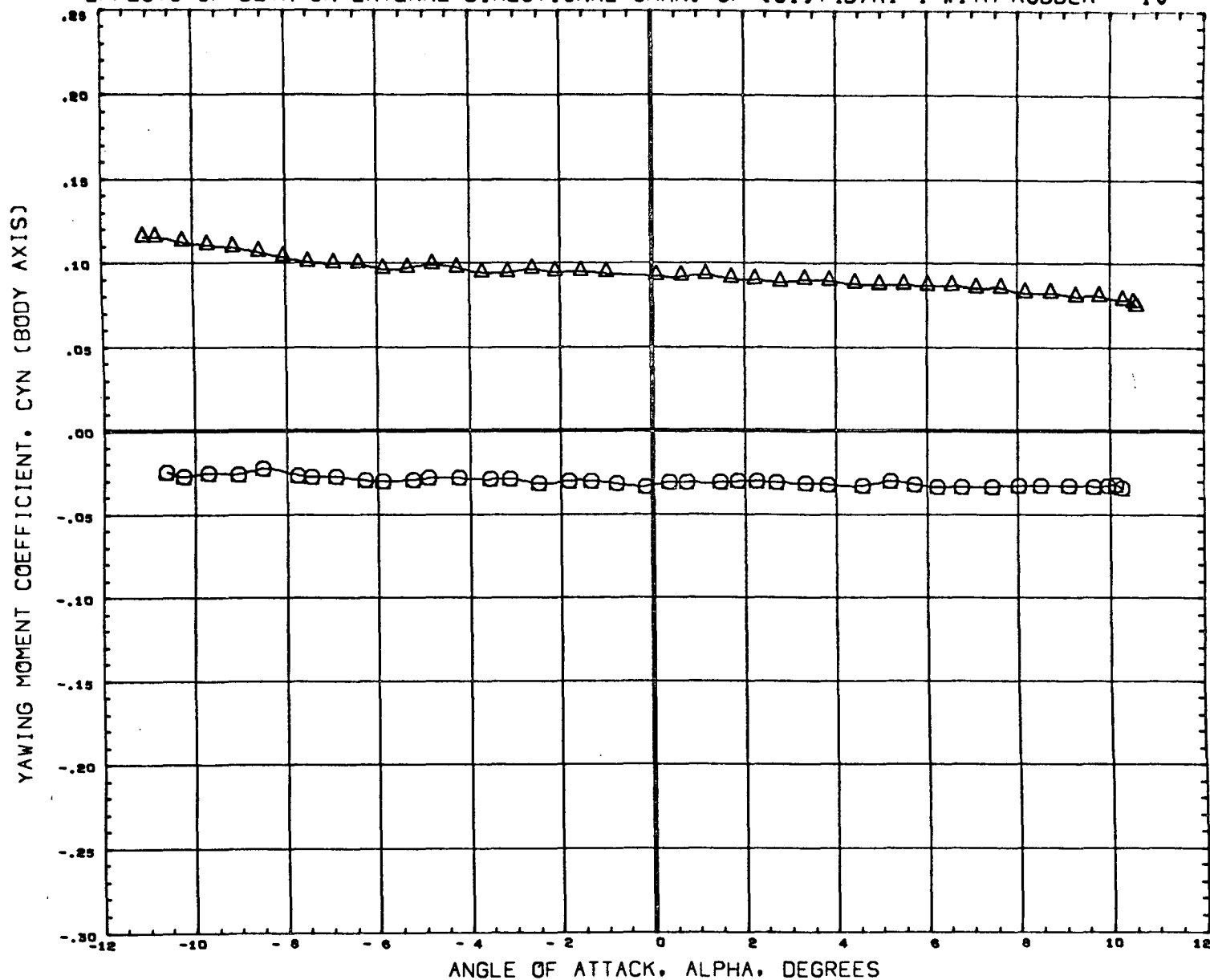
BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 10.000
 6.000 0.000 0.000 10.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH 1.09

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHAR. OF (01)T487A1-4 WITH RUDDER = 10



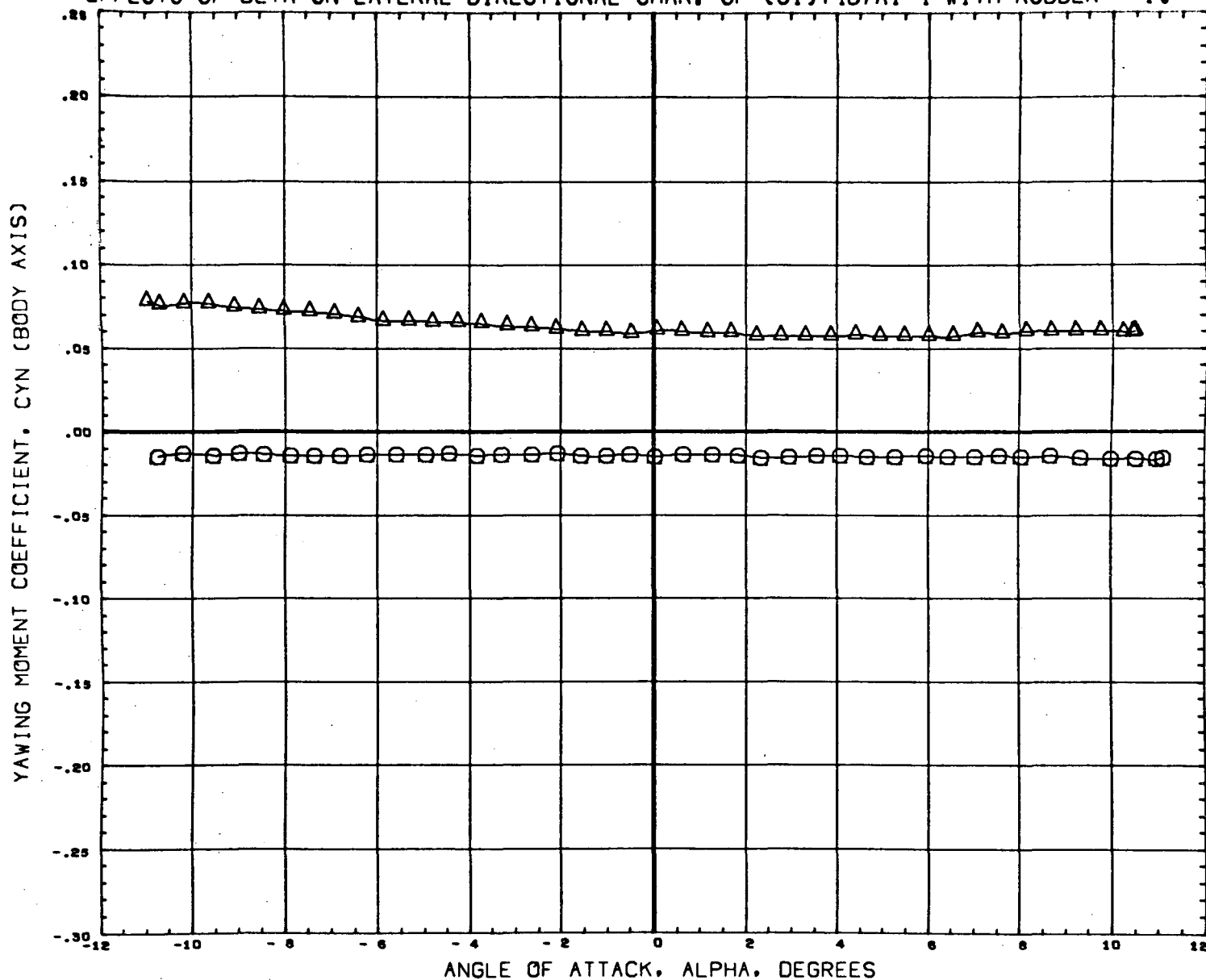
DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (RD7404) ○ MDAC S-222 COMPOSITE(T-CG) (01)T487A1-4
 (TD7406) △ MDAC S-222 COMPOSITE(T-CG) (01)T487A1-4

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-------|--------|--------|--------|-----------------------|-----------|--------|
| 0.000 | 0.000 | 0.000 | 10.000 | SREF | 3155.3040 | SQ.FT. |
| 6.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 | IN. |
| | | | | BREF | 882.0004 | IN. |
| | | | | XMRP | 557.0004 | IN. |
| | | | | YMRP | 0.0000 | IN. |
| | | | | ZMRP | 200.0004 | IN. |
| | | | | SCALE | 0.0060 | SCALE |

MACH 1.51

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHAR. OF (01)T4B7A1-4 WITH RUDDER = 10

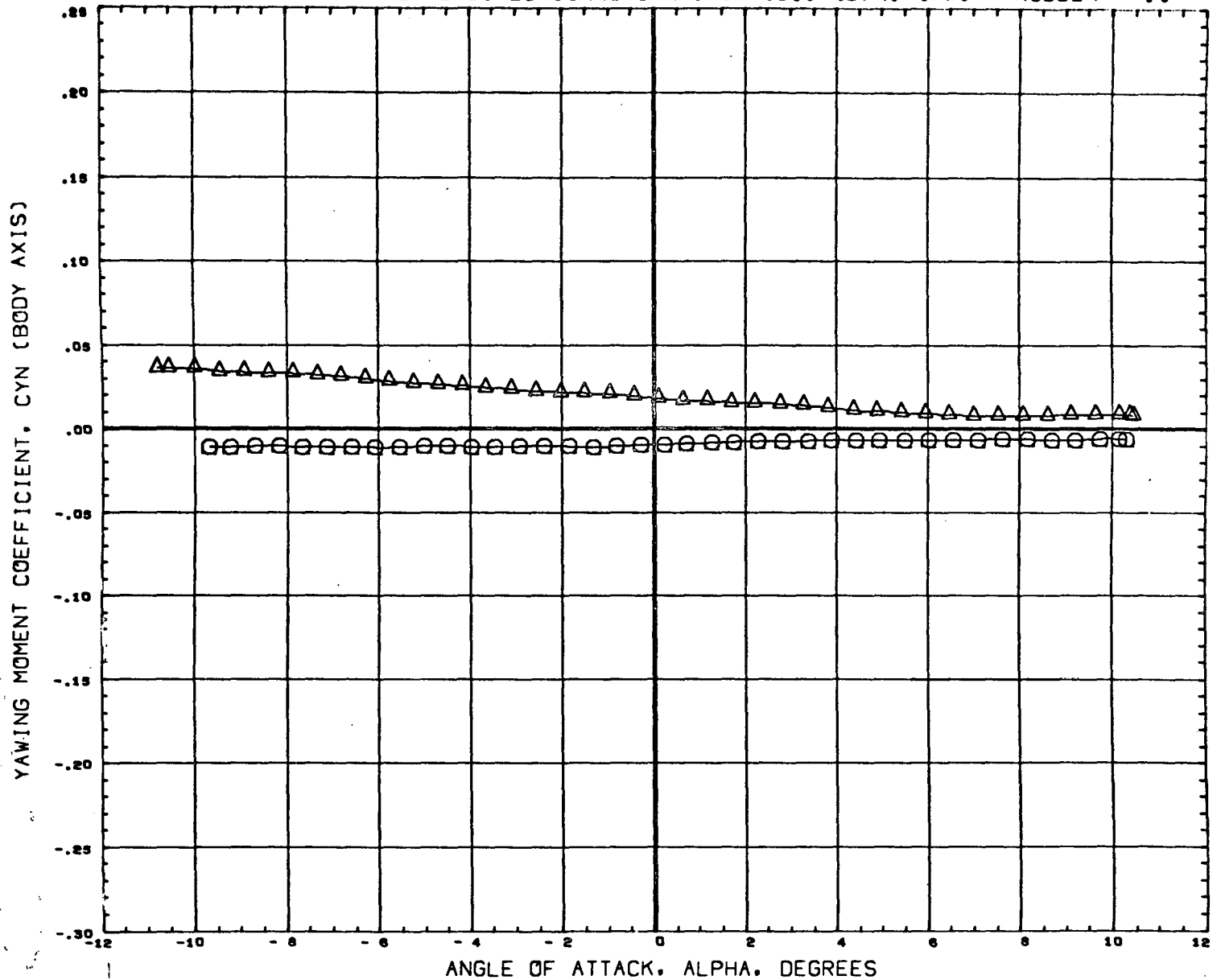


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74D4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | SREF | 3155.3040 SQ.FT. |
| (TD74D6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHAR. OF (01)T4B7A1-4 WITH RUDDER = 10



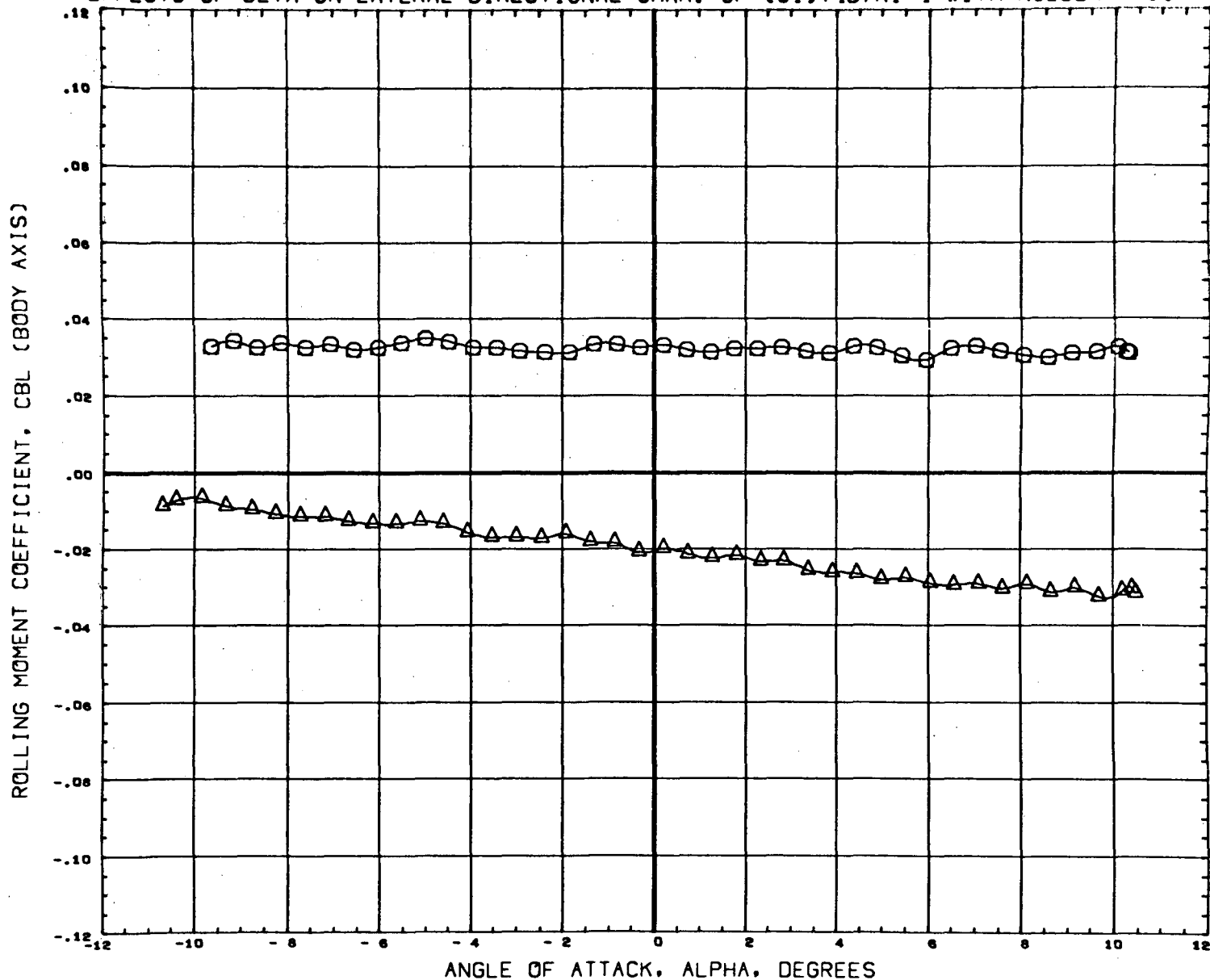
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74D4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | SREF | 3155.3040 SQ.FT. |
| (TD74D6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH

4.47

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHAR. OF (01)T4B7A1-4 WITH RUDDER = 10



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(RD7404) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (TD7406) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 10.000 |
| 6.000 | 0.000 | 0.000 | 10.000 |

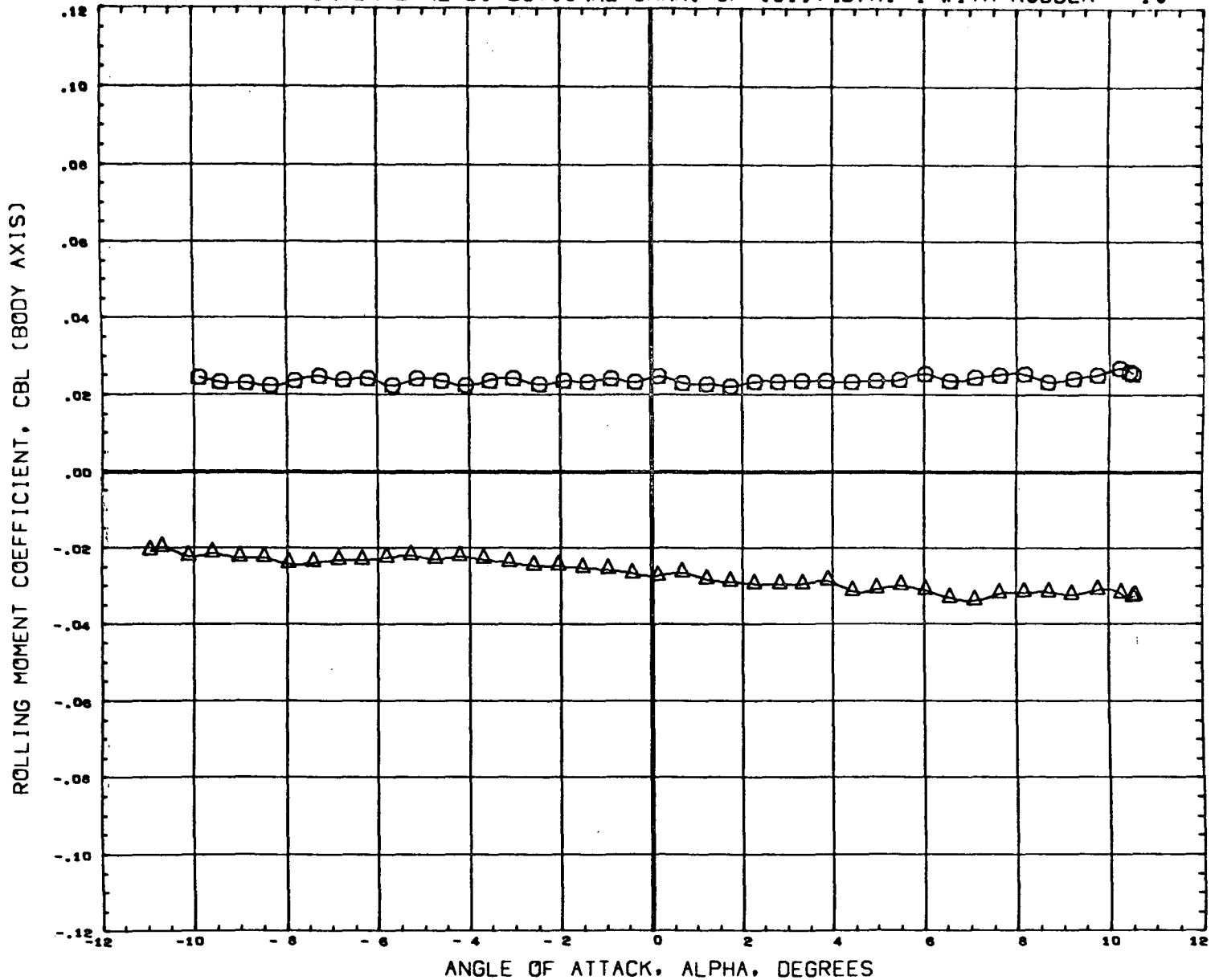
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH

.58

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHAR. OF (O1)T4B7A1-4 WITH RUDDER = 10

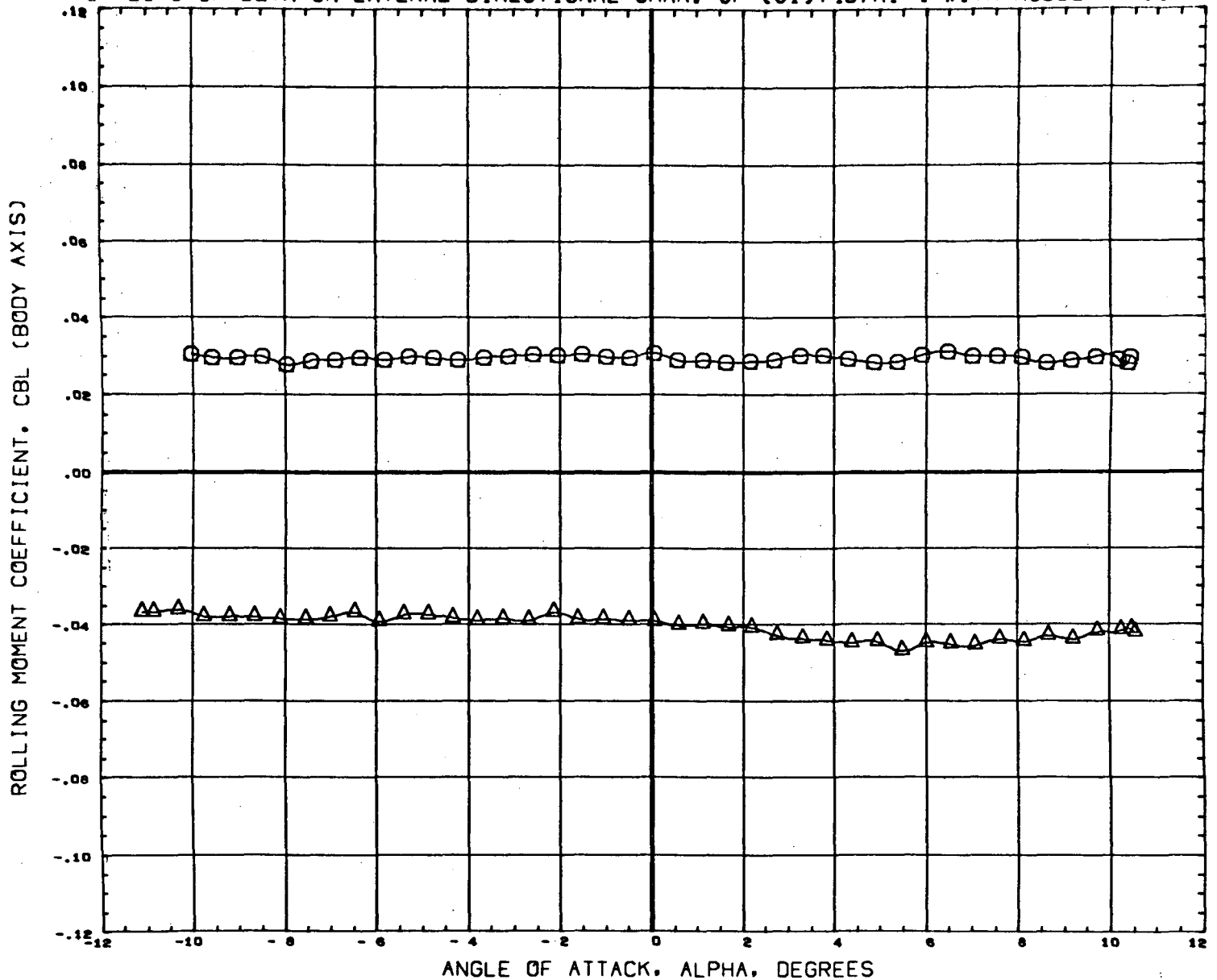


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74D4) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | SREF | 3155.3040 SQ.FT. |
| (TD74D6) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .89

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHAR. OF (01)T4B7A1-4 WITH RUDDER = 10

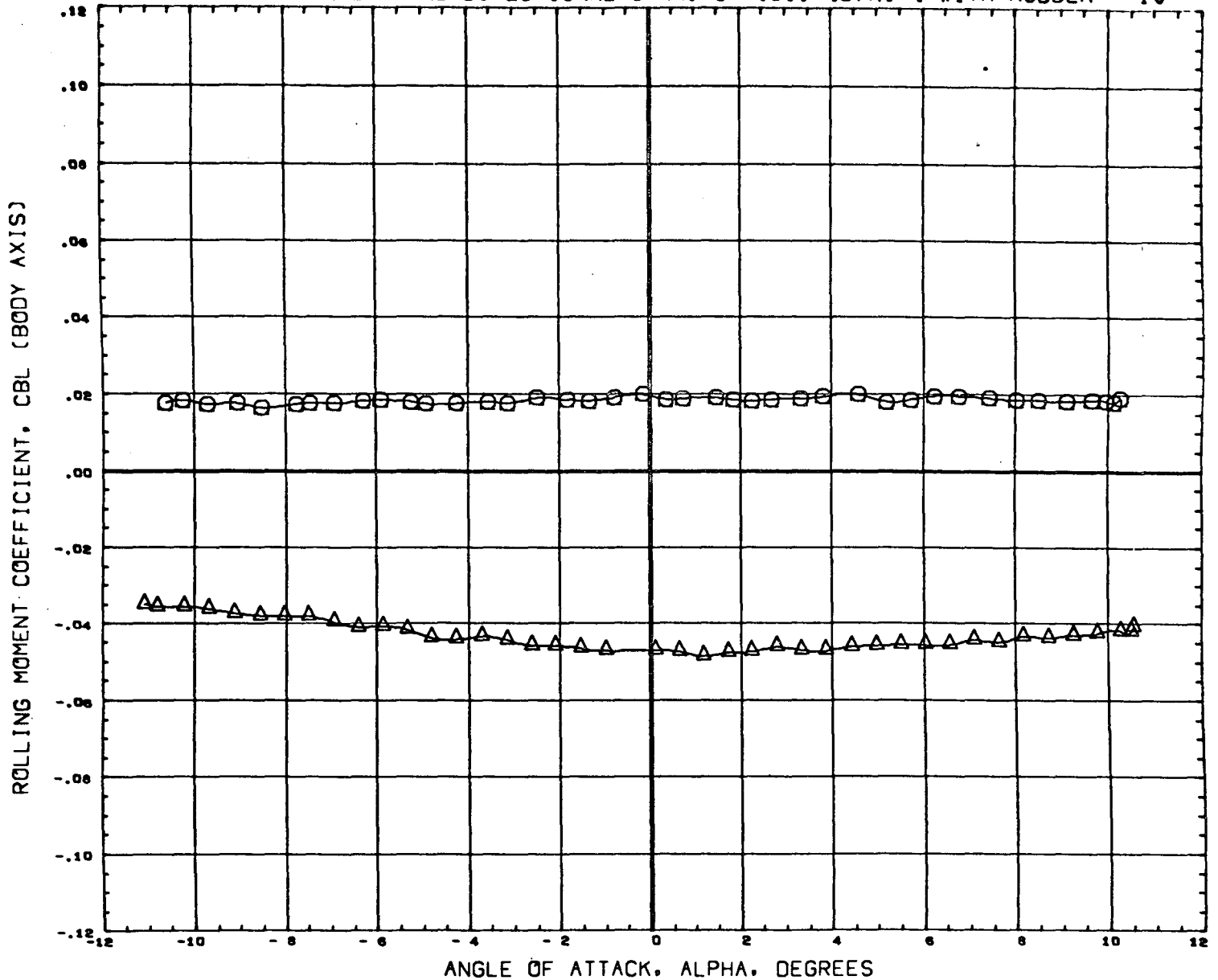


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74D4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | SREF | 3155.3040 SQ.FT. |
| (TD74D6) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | YMRP | 557.0004 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.09

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHAR. OF (01)T4B7A1-4 WITH RUDDER = 10



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD7404) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | SREF | 3155.3040 SQ.FT. |
| (TD7406) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 10.000 | LREF | 609.3004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0080 SCALE |

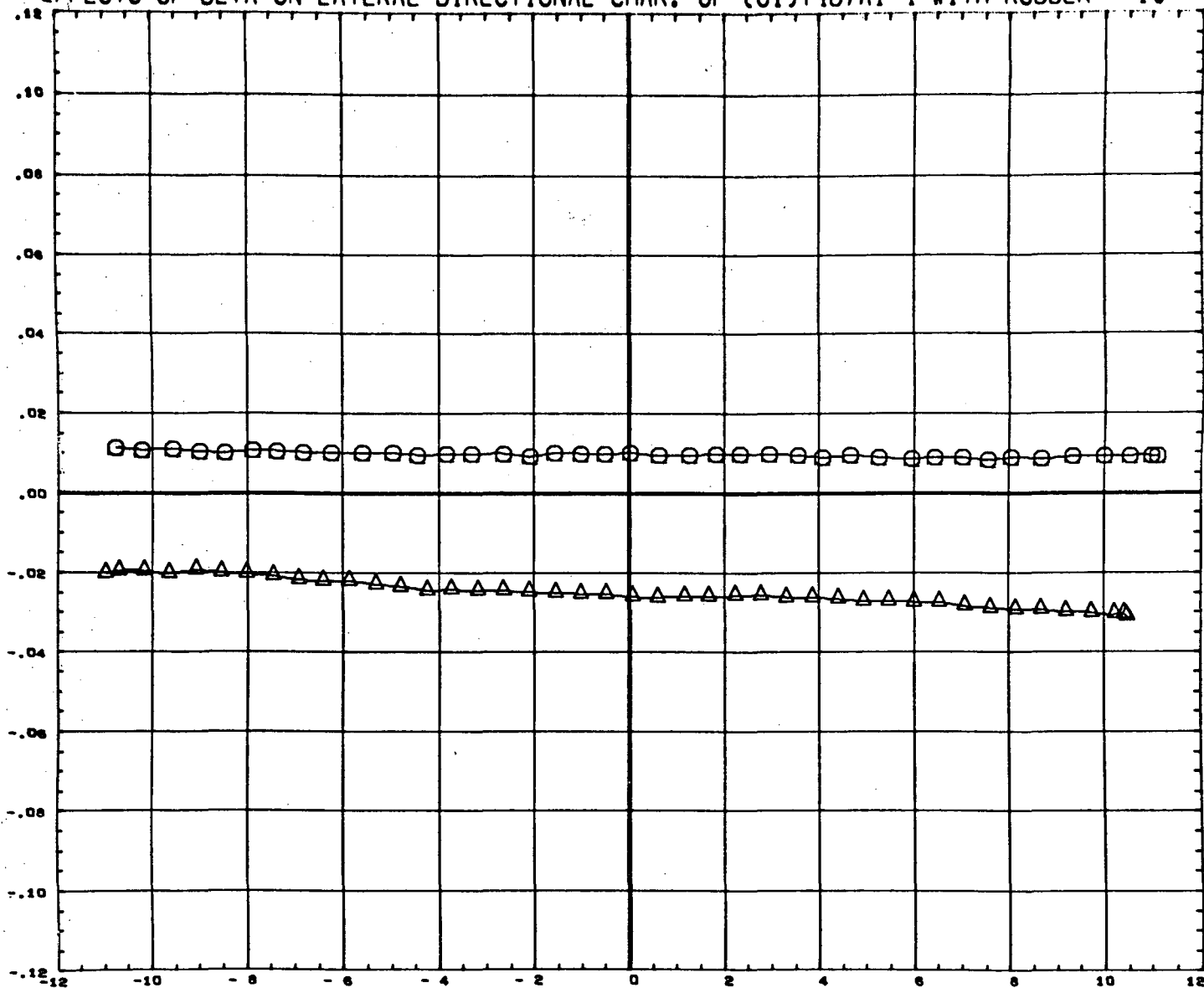
MACH

1.51

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHAR. OF (O1)T4B7A1-4 WITH RUDDER = 10

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



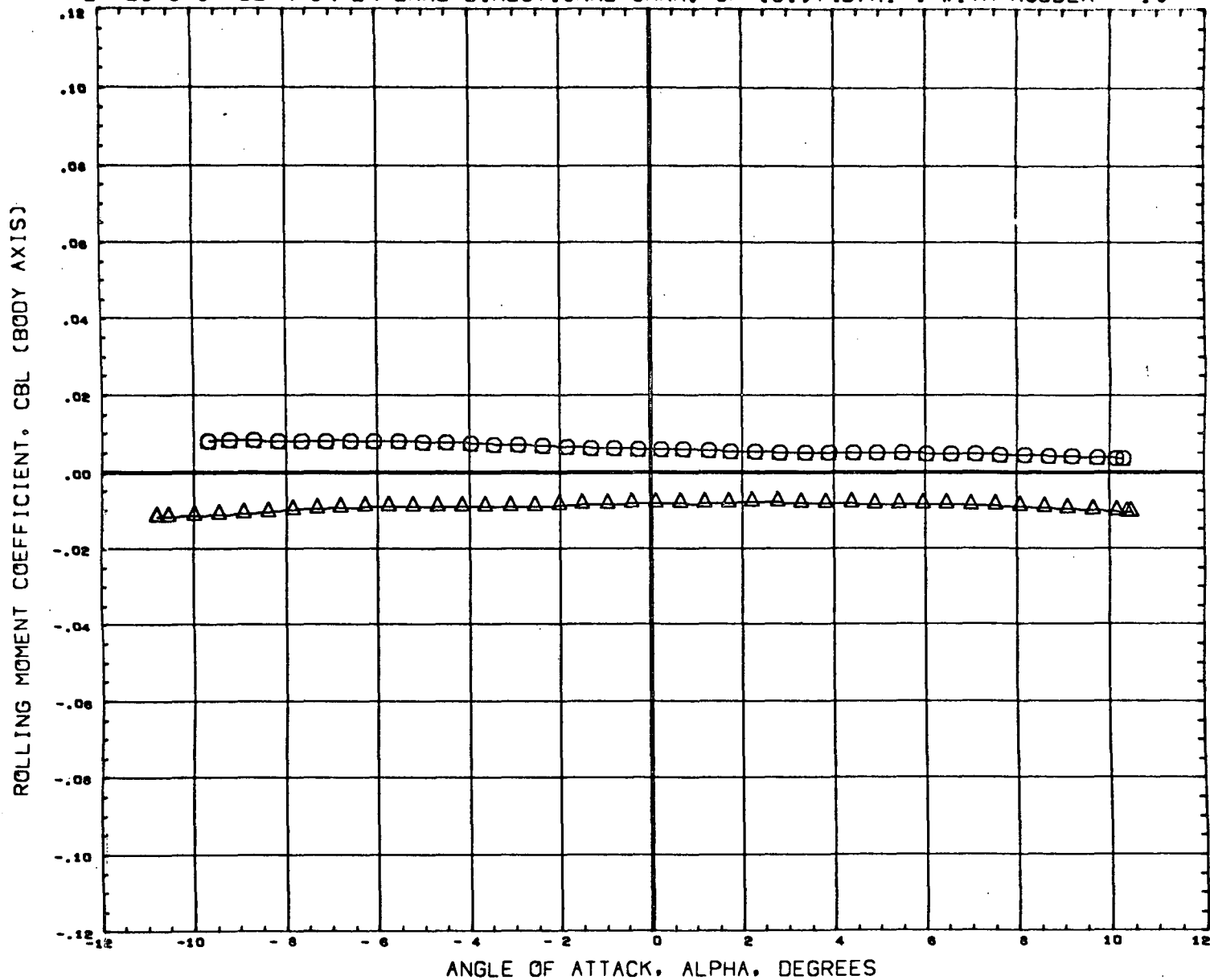
ANGLE OF ATTACK, ALPHA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74D4) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | SREF | 3155.3040 SQ.FT. |
| (TD74D6) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHAR. OF (01)T4B7A1-4 WITH RUDDER = 10



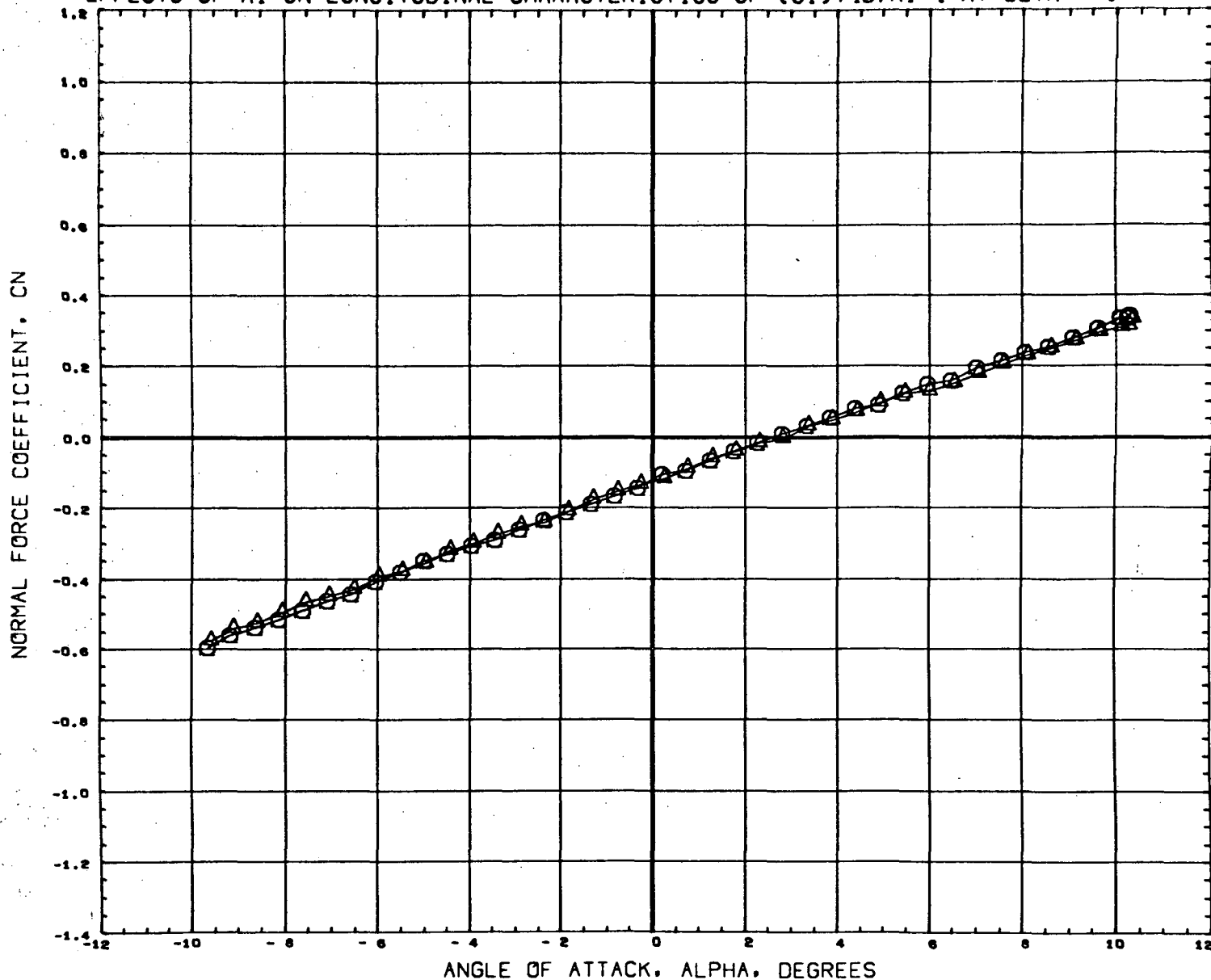
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74D4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 10.000 | SREF | 3155.3040 SQ.FT. |
| (TD74D6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 10.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH

4.47

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4 AT BETA = 0

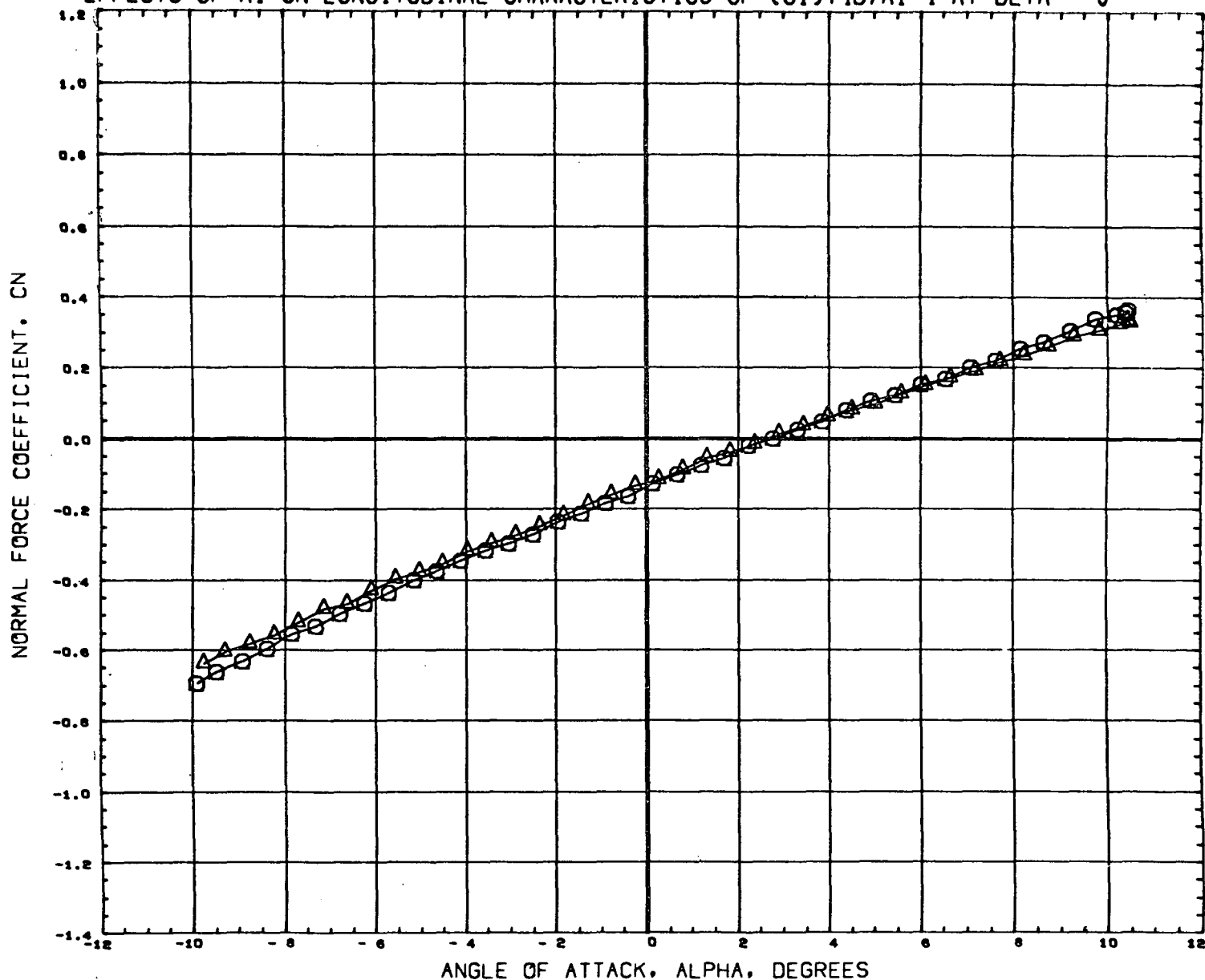


| DATA SET SYMBOL | | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-----------------|---|---|-------|--------|--------|--------|-----------------------|-----------|--------|
| (CD74C7) | ⊙ | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| (CD74D7) | △ | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | | | | BREF | 882.0004 | IN. |
| | | | | | | | XMRP | 557.0004 | IN. |
| | | | | | | | YMRP | 0.0000 | IN. |
| | | | | | | | ZMRP | 200.0004 | IN. |
| | | | | | | | SCALE | 0.0060 | SCALE |

MACH .58

PAGE 273

EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4 AT BETA = 0



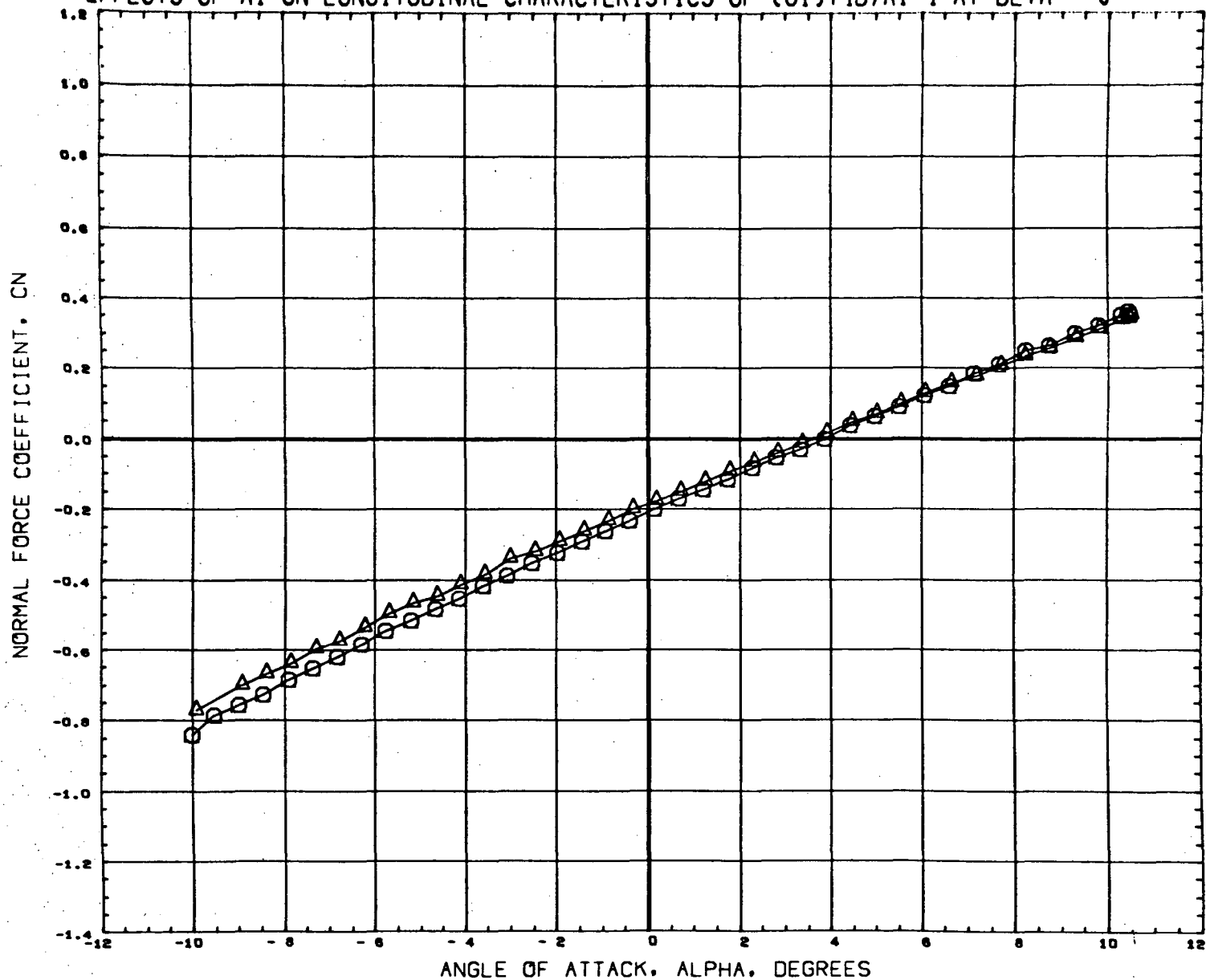
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-----------------|--|-------|--------|--------|--------|-----------------------|-----------|--------|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| (CD74D7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | | | BREF | 882.0004 | IN. |
| | | | | | | XMRP | 557.0004 | IN. |
| | | | | | | YMRP | 0.0000 | IN. |
| | | | | | | ZMRP | 200.0004 | IN. |
| | | | | | | SCALE | 0.0060 | SCALE |

MACH

.90

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74D7) MDAC S-222 COMPOSITE(T-CG) (01)T4B7-4

BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 0.000

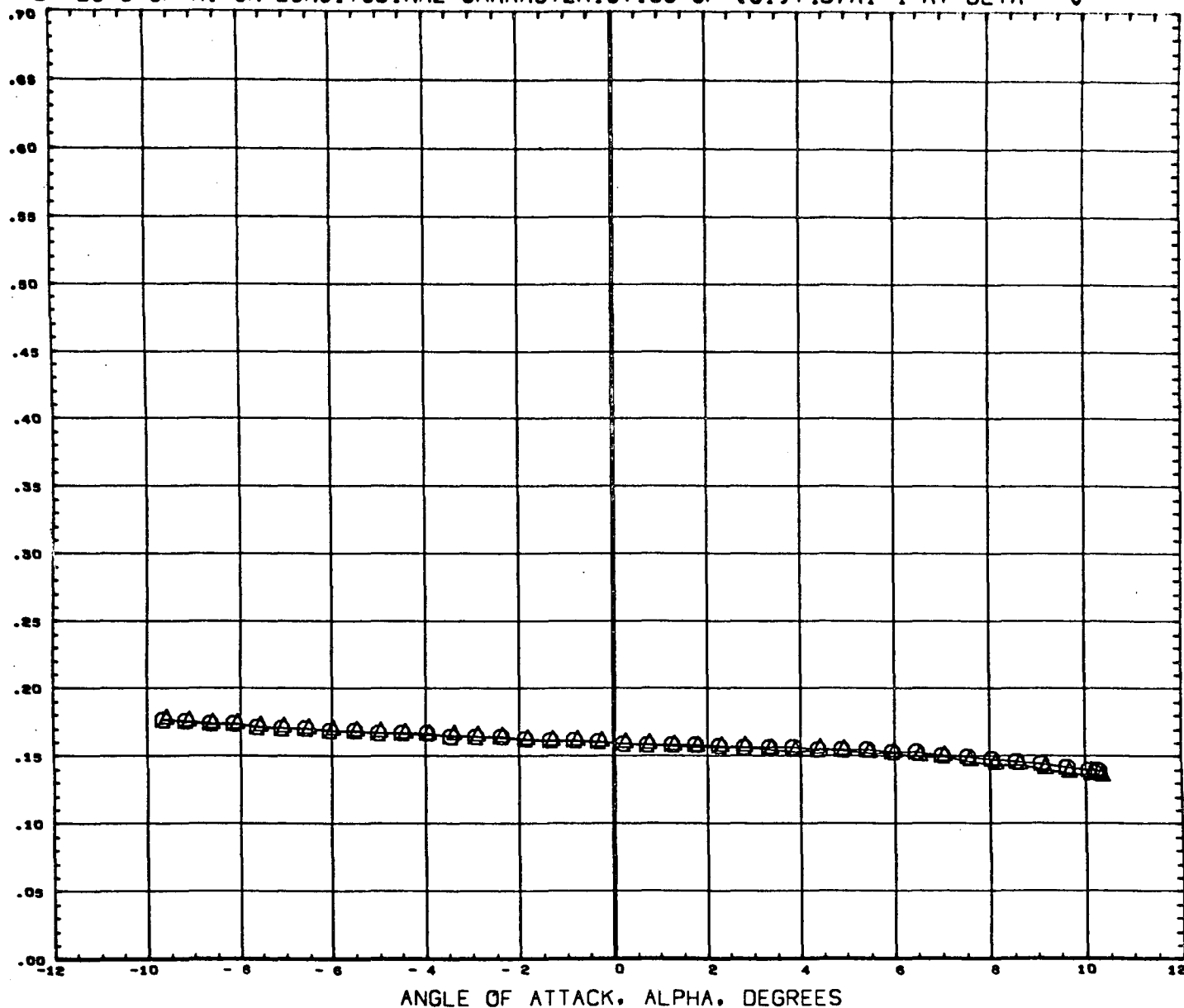
REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRF 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH 1.08

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4 AT BETA = 0


AXIAL FORCE COEFFICIENT, CA



ANGLE OF ATTACK, ALPHA, DEGREES

DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

(CD74D7)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7-4

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

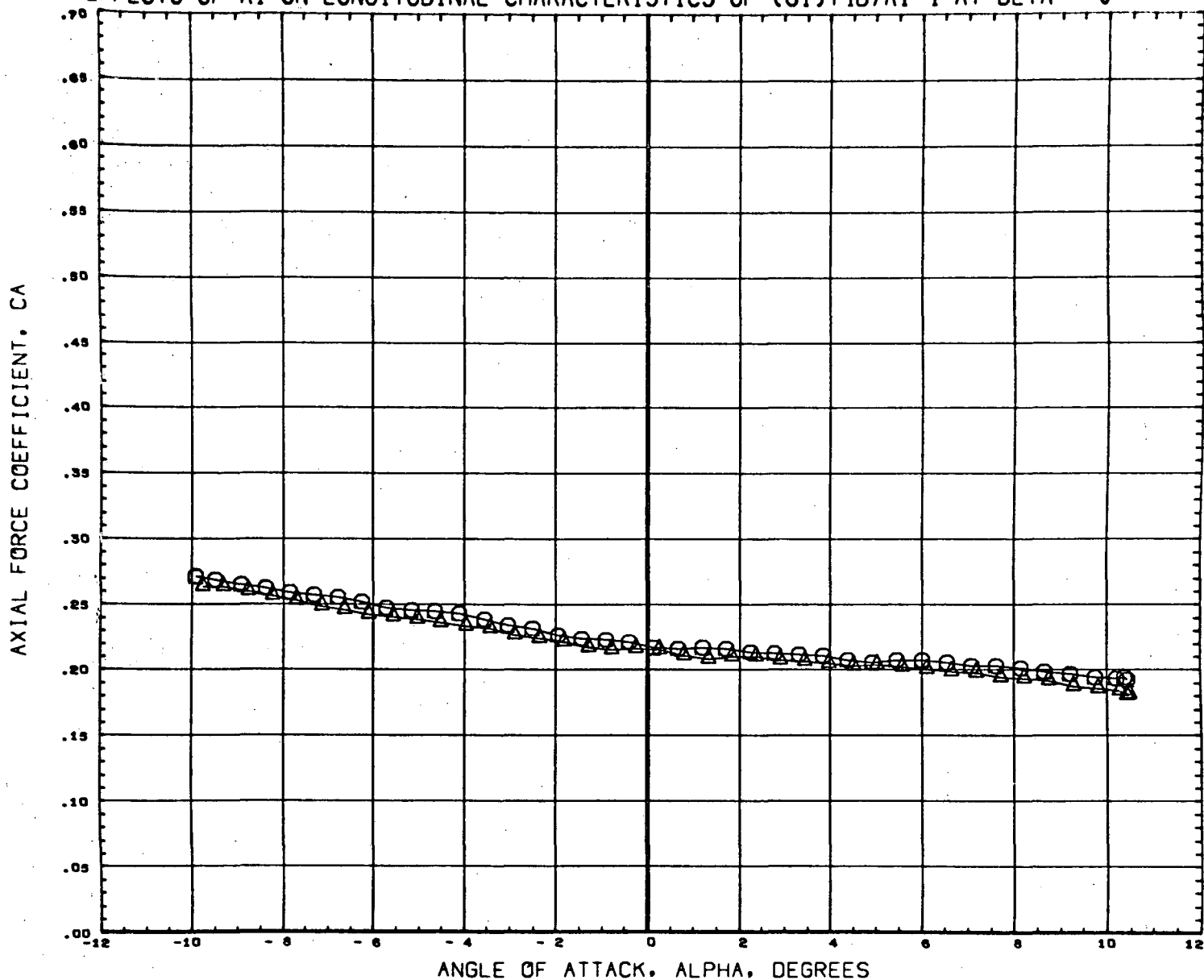
| REFERENCE INFORMATION | |
|-----------------------|------------------|
| SREF | 3155.3040 SQ.FT. |
| LREF | 609.5004 IN. |
| BREF | 862.0004 IN. |
| XMRP | 957.0004 IN. |
| YMRP | 0.0000 IN. |
| ZMRP | 200.0004 IN. |
| SCALE | 0.0060 SCALE |

MACH

.58

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4 AT BETA = 0



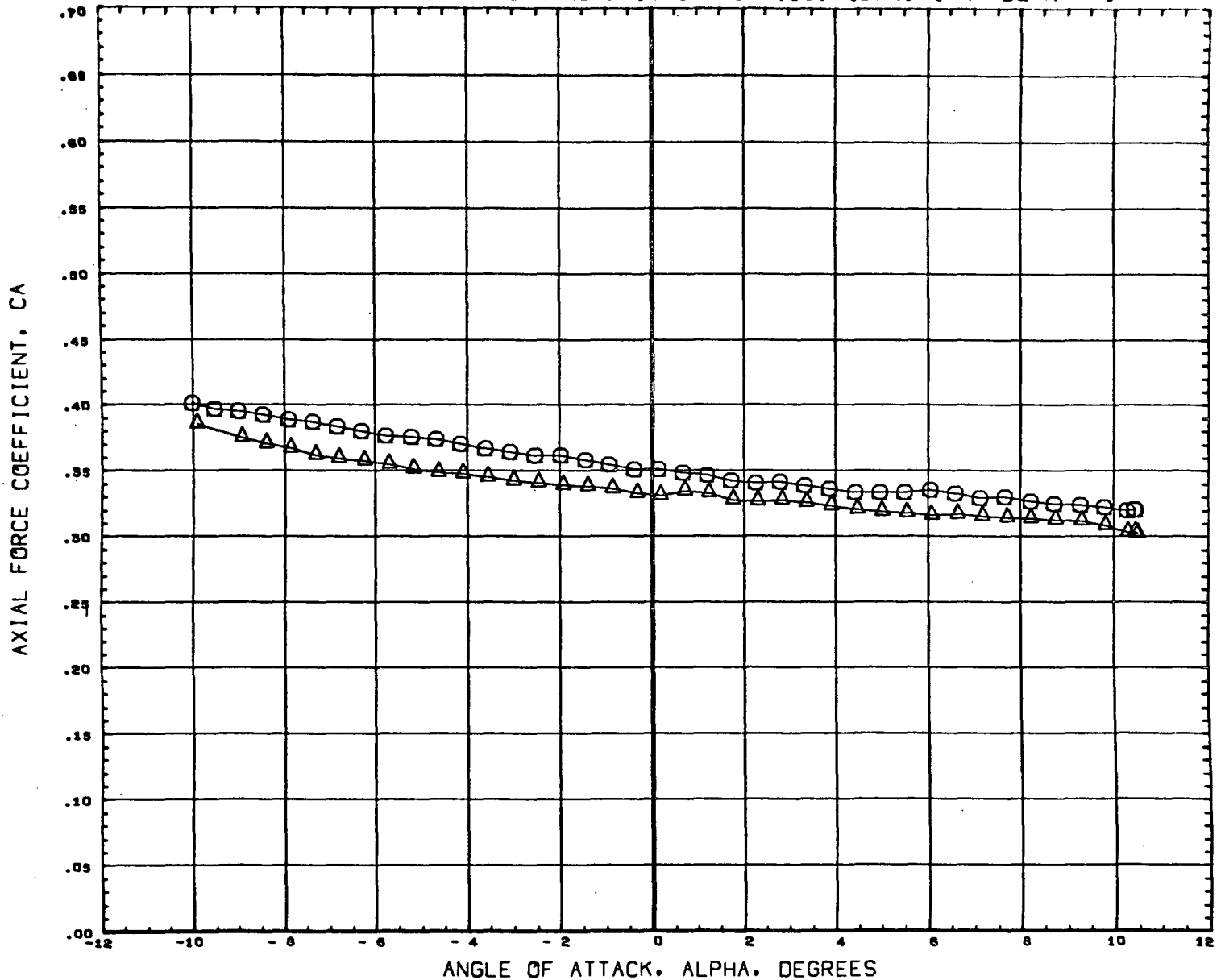
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|--|---|
| (CD74C7)  | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 |
| (CD74D7)  | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH .90

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) ○ MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD7407) △ MDAC S-222 COMPOSITE(T-CG) (01)T4B7-4

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

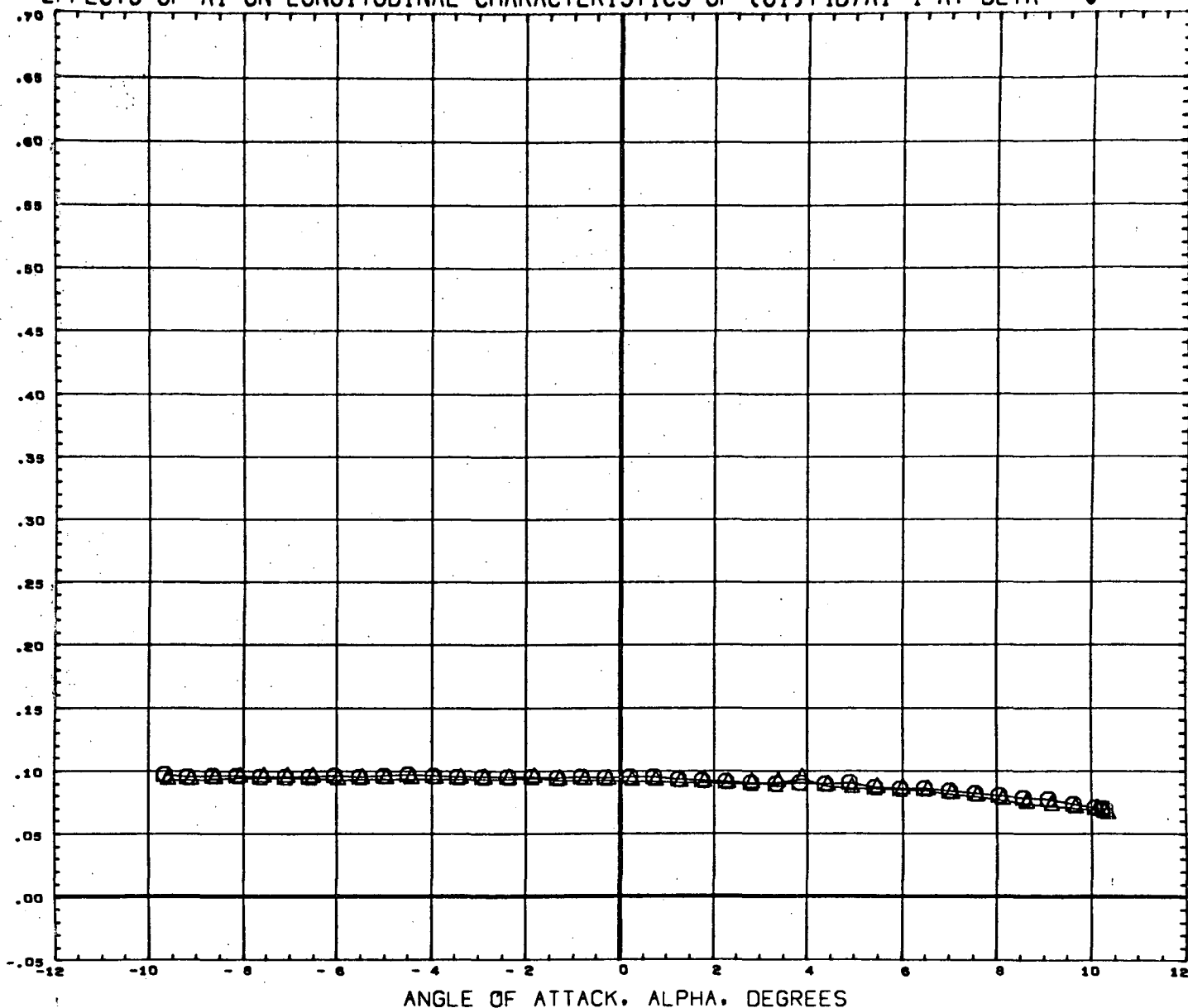
MACH

1.08

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4 AT BETA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



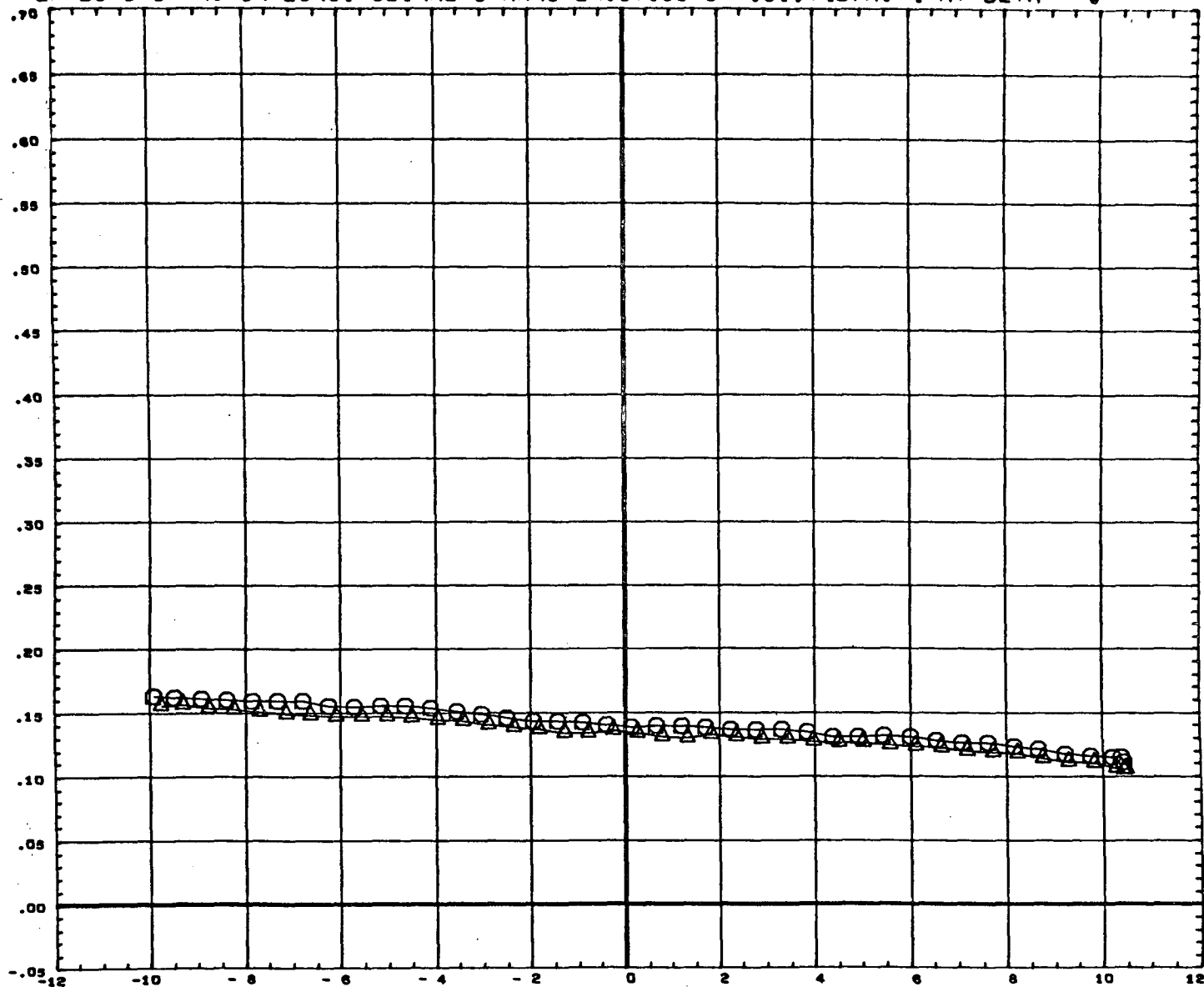
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D7) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRF | 537.0004 IN. |
| | | | | | | YMRF | 0.0000 IN. |
| | | | | | | ZMRF | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4 AT BETA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



ANGLE OF ATTACK, ALPHA, DEGREES

DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) (O) MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4
 (CD74D7) (A) MDAC S-222 COMPOSITE(T-CG) (O1)T4B7-4

BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 0.000

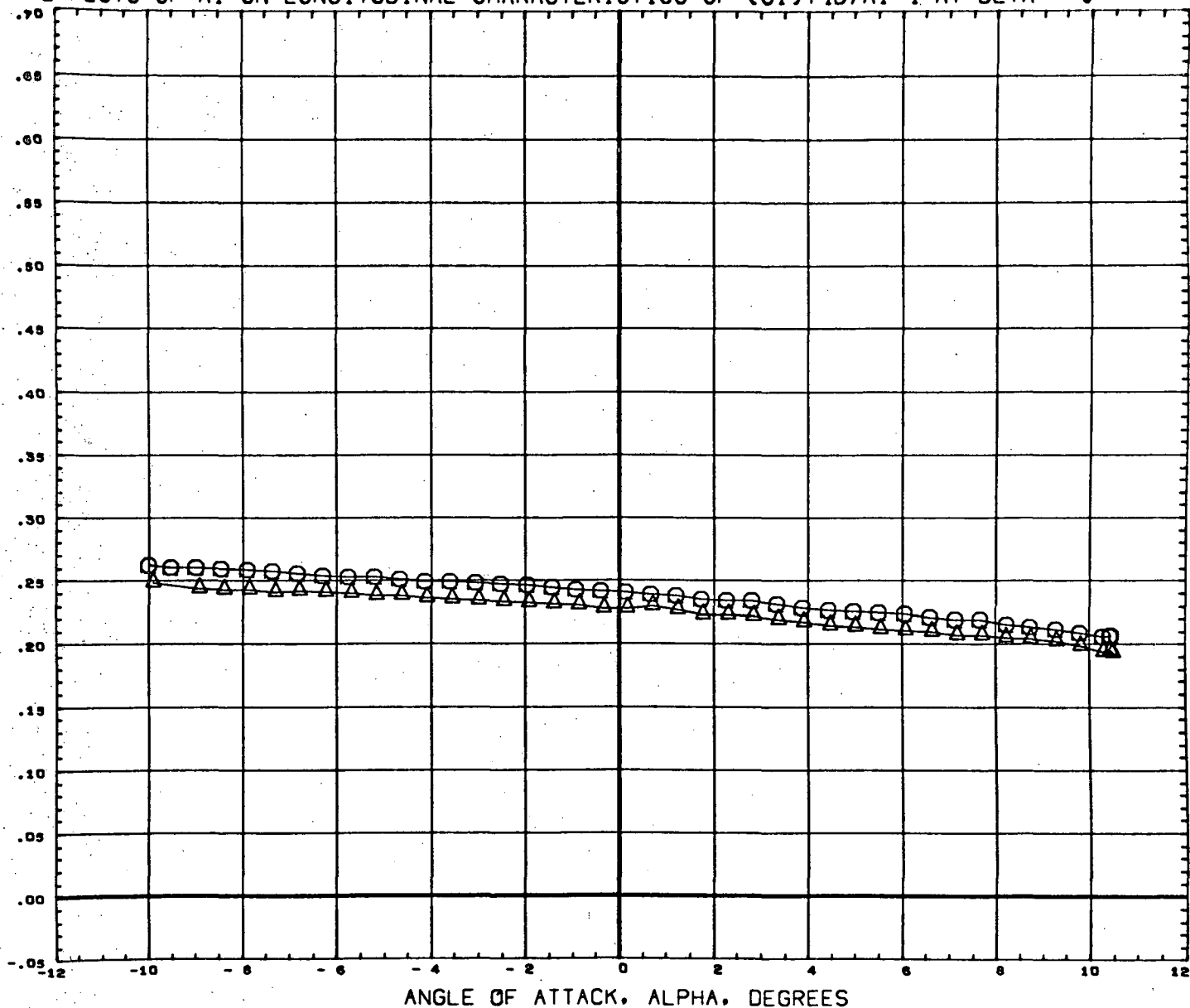
REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH .90

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4 AT BETA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



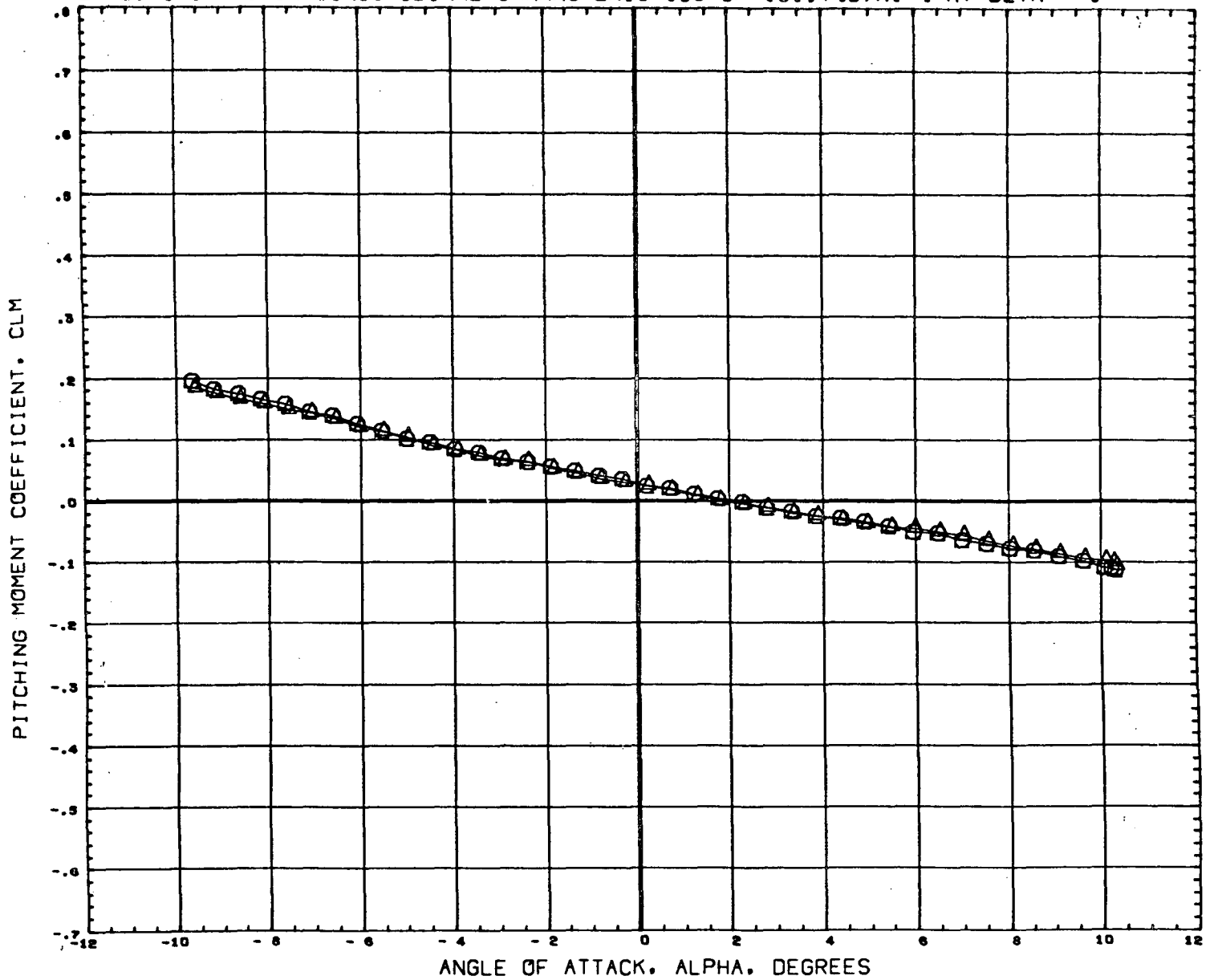
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (CD74D7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH 1.08

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 |
| (CD74D7) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7-4 |

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

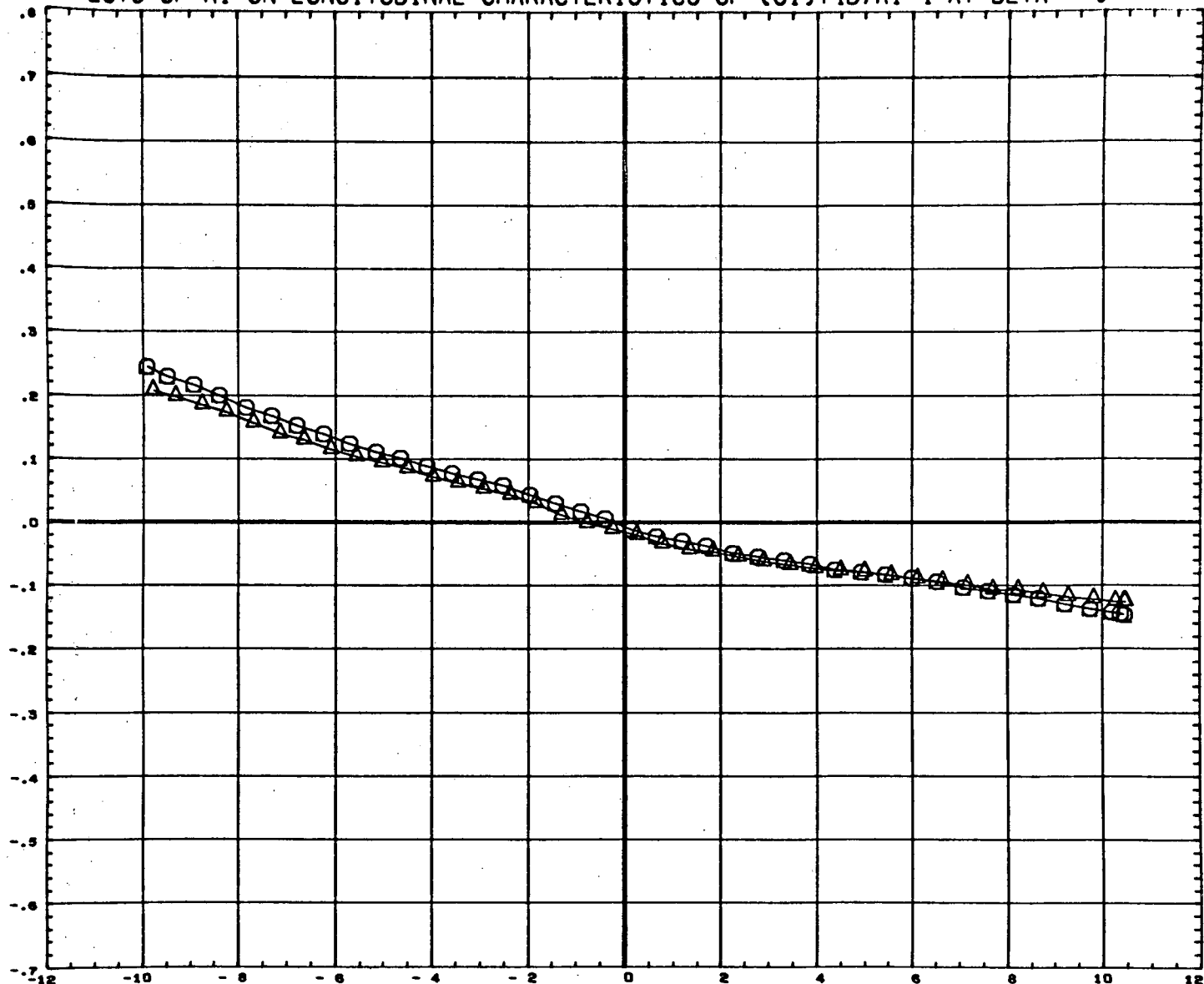
| REFERENCE INFORMATION | |
|-----------------------|------------------|
| SREF | 3155.3040 SQ.FT. |
| LREF | 609.5004 IN. |
| BREF | 882.0004 IN. |
| XMRP | 557.0004 IN. |
| YMRP | 0.0000 IN. |
| ZMRP | 200.0004 IN. |
| SCALE | 0.0060 SCALE |

MACH .58

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4 AT BETA = 0

PITCHING MOMENT COEFFICIENT, CLM



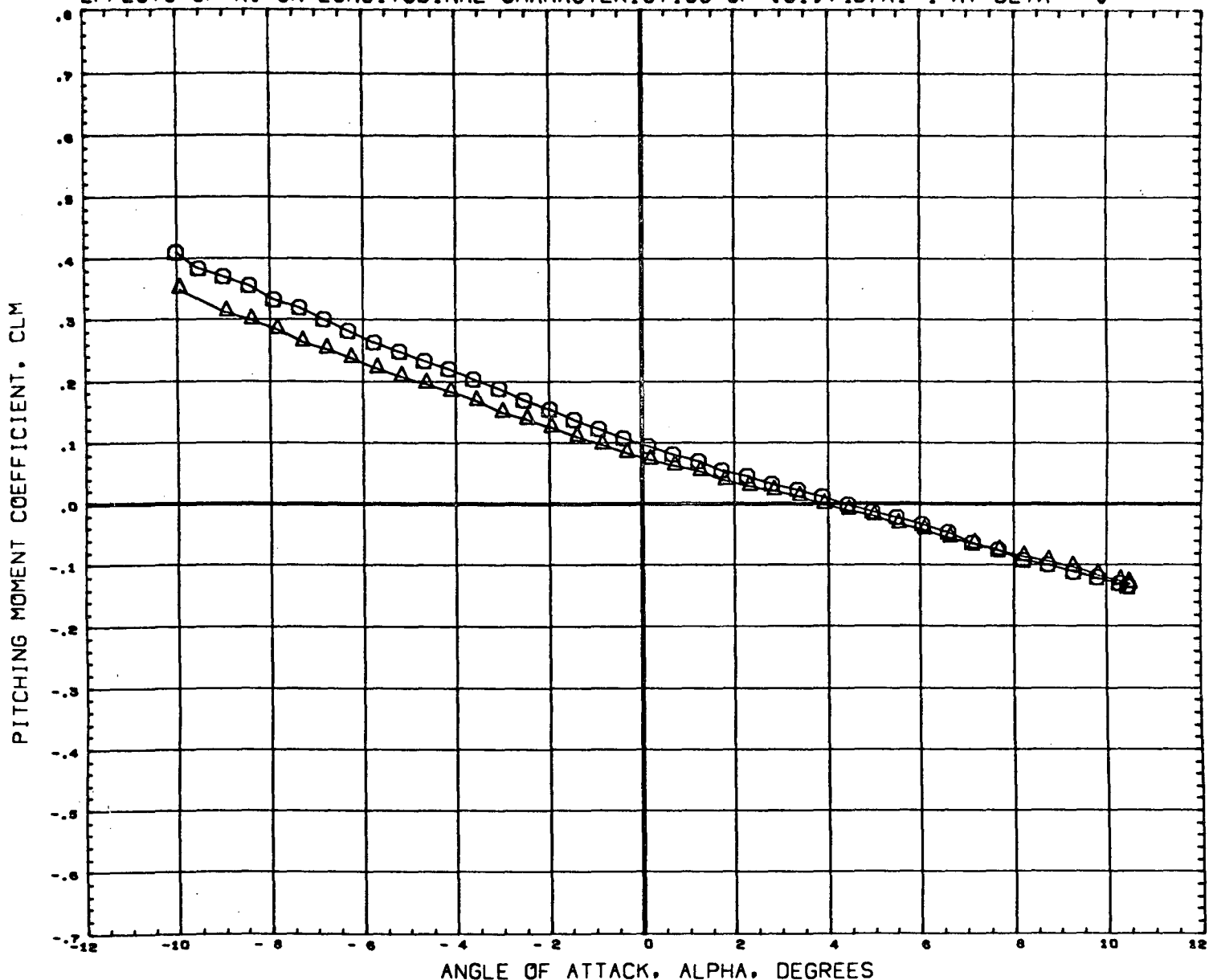
ANGLE OF ATTACK, ALPHA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) (O) MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4
 (CD74D7) (Δ) MDAC S-222 COMPOSITE(T-CG) (O1)T4B7-4

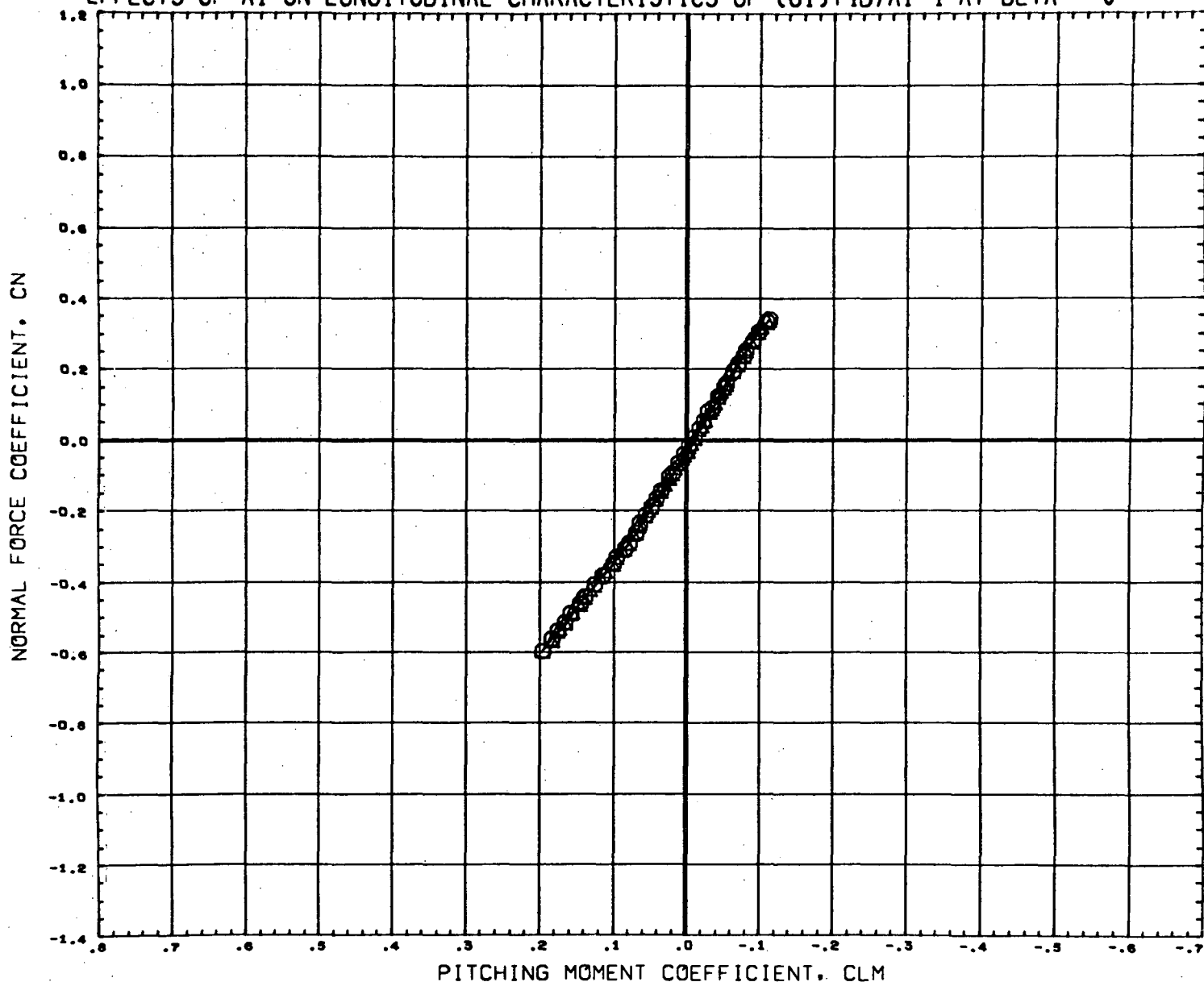
| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH

1.08

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4 AT BETA = 0



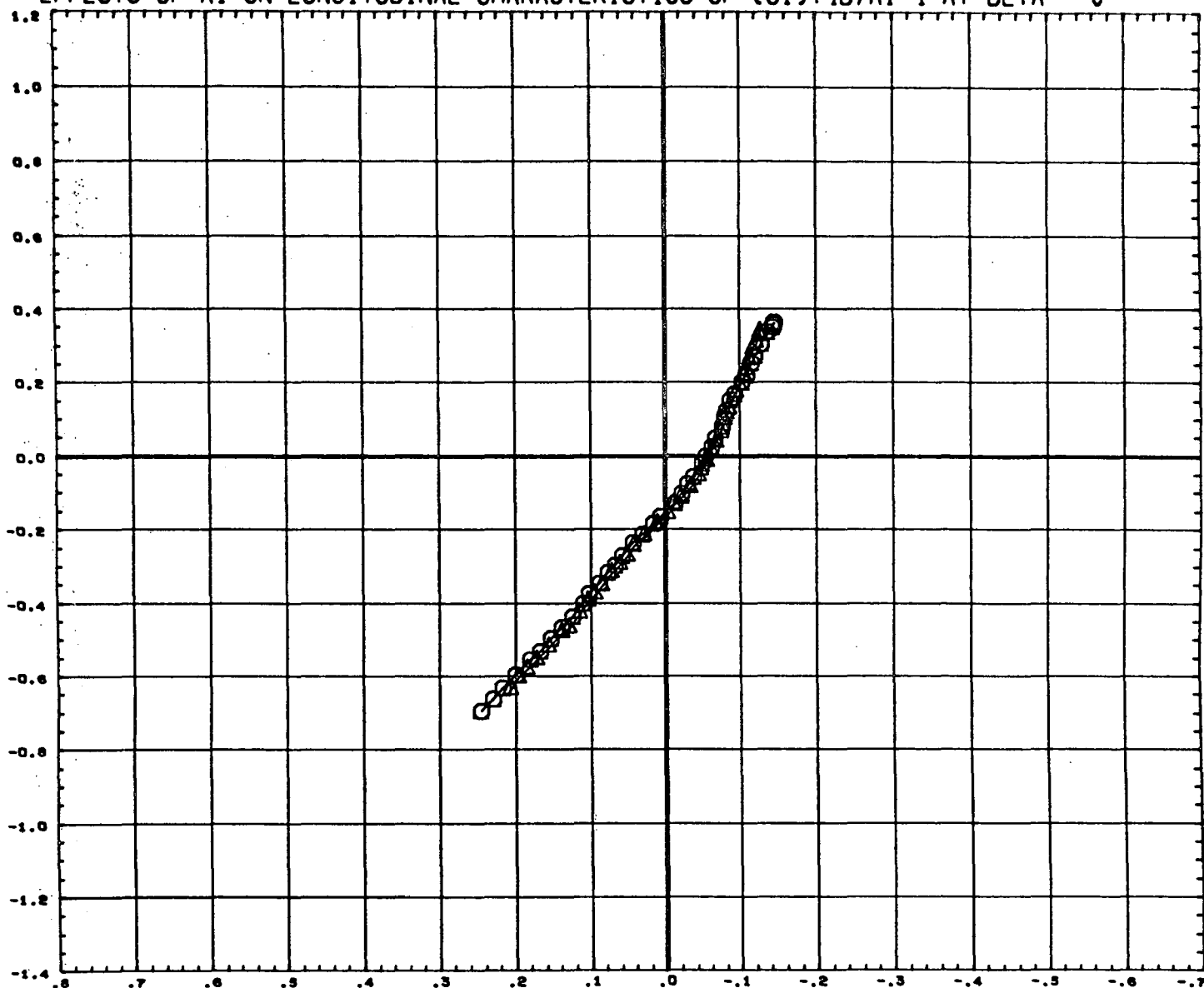
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-----------------|---|-------|--------|--------|--------|-----------------------|-----------|--------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | sq.ft. |
| (CD74D7) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | | | BREF | 882.0004 | IN. |
| | | | | | | XMRP | 557.0004 | IN. |
| | | | | | | YMRP | 0.0000 | IN. |
| | | | | | | ZMRP | 200.0004 | IN. |
| | | | | | | SCALE | 0.0060 | SCALE |

MACH .58

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4 AT BETA = 0

NORMAL FORCE COEFFICIENT, CN



PITCHING MOMENT COEFFICIENT, CLM

DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) Q MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4
 (CD74D7) Δ MDAC S-222 COMPOSITE (T-CG) (O1)T4B7-4

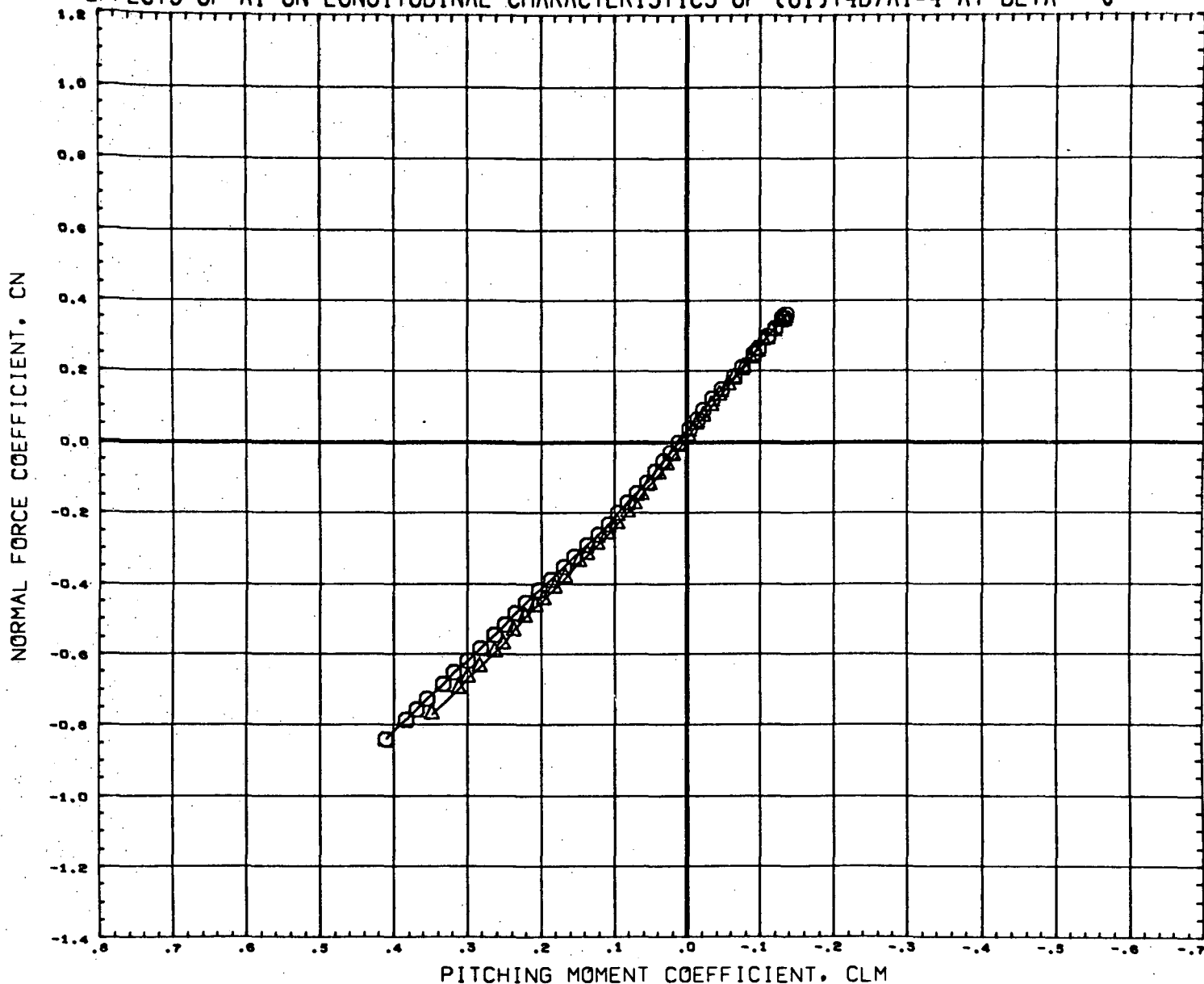
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH .90

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4 AT BETA = 0

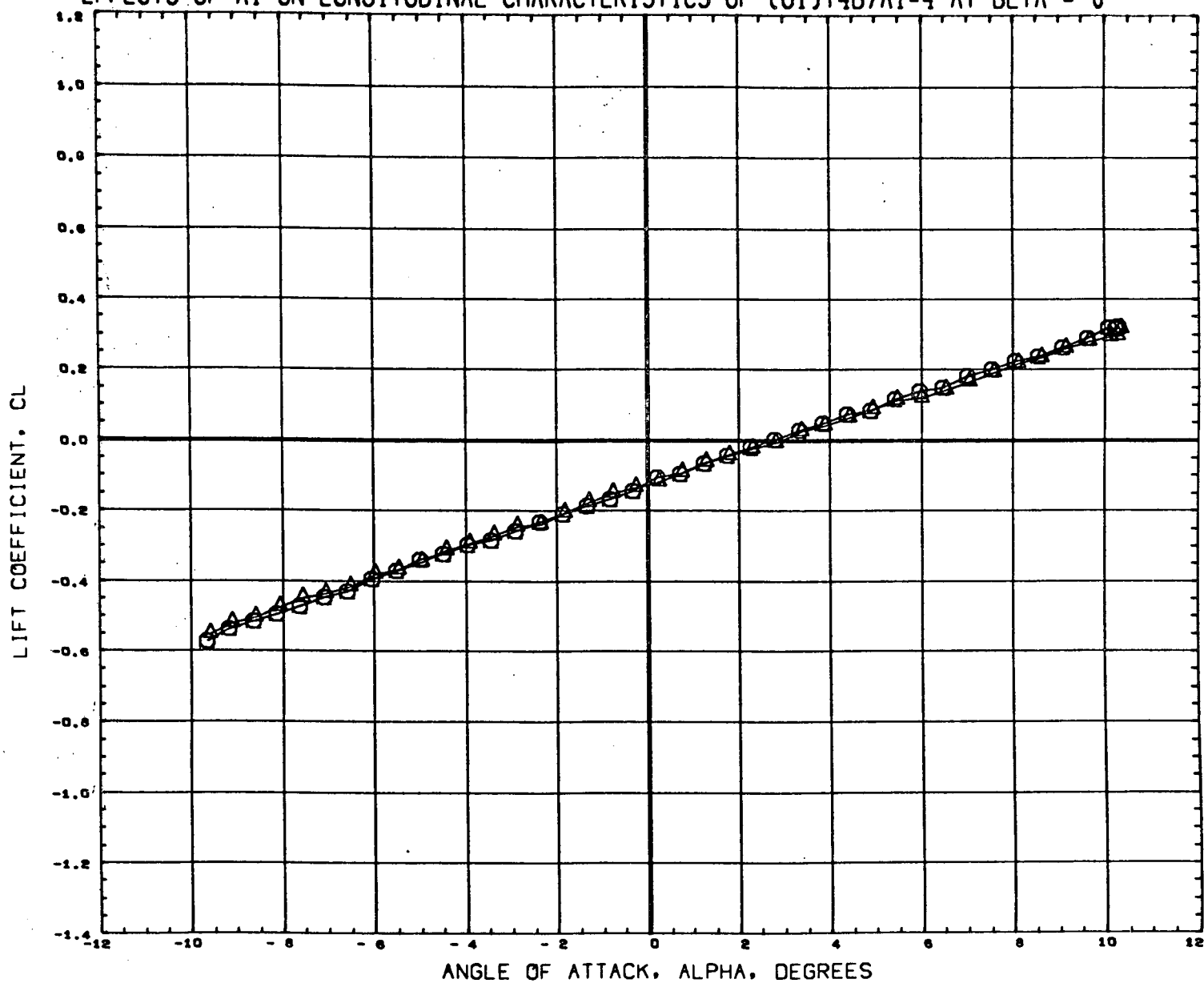


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D7) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

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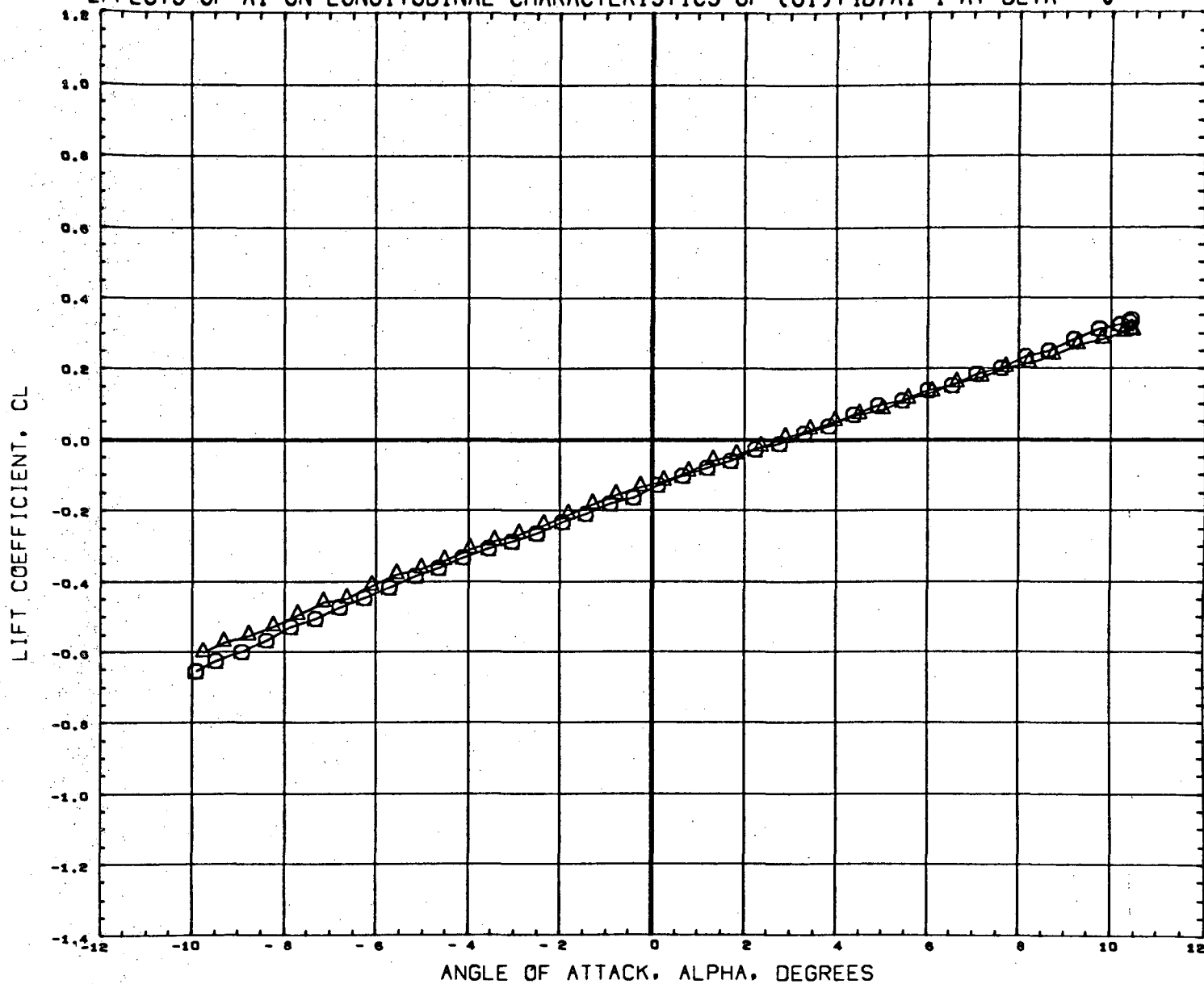
EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XM RP | 557.0004 IN. |
| | | | | | | YM RP | 0.0000 IN. |
| | | | | | | ZM RP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (CD74D7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7-4 |

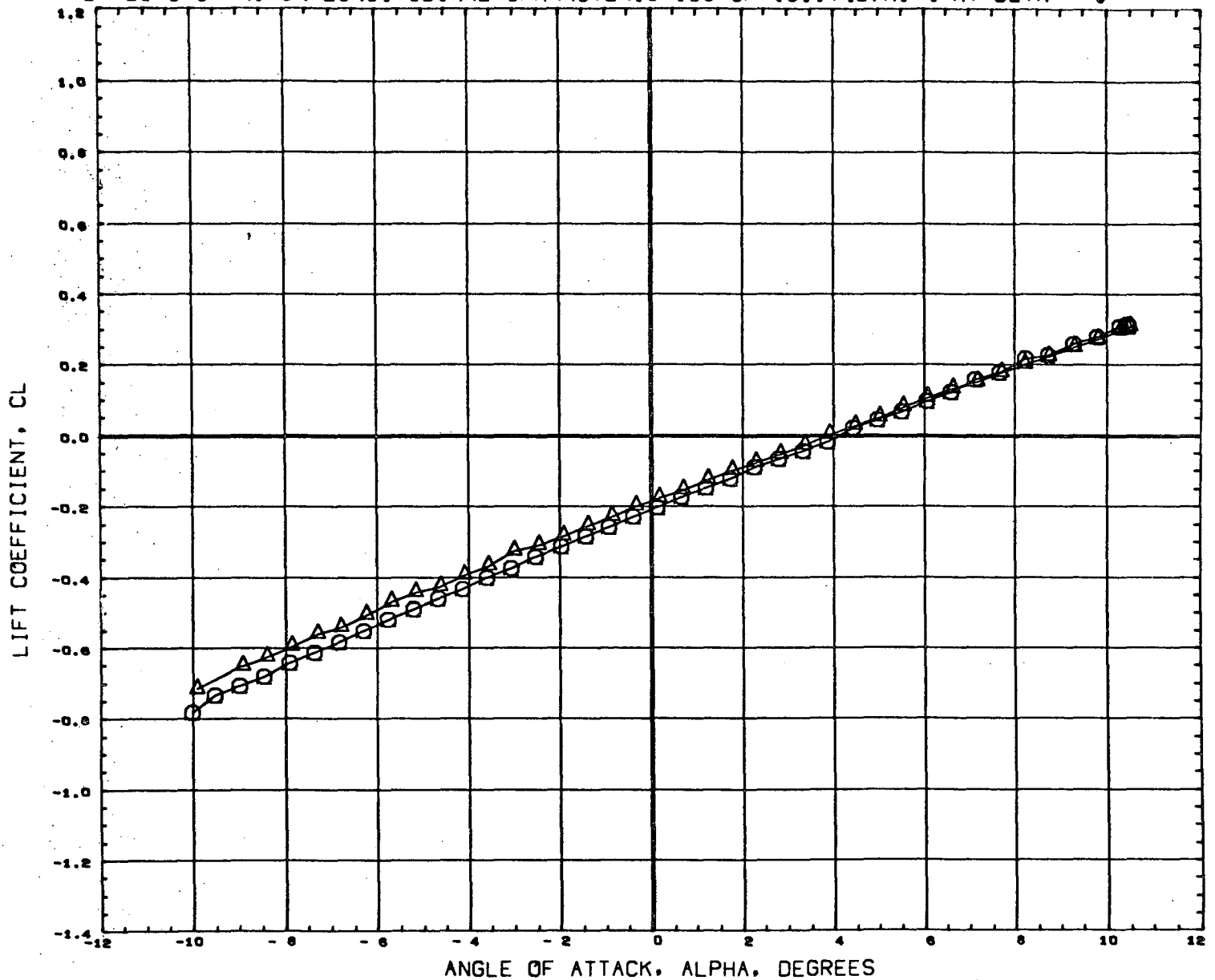
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH .90

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) (01)T4B7A1-4
 (CD74D7) (01)T4B7-4

BETA ELEVTB AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

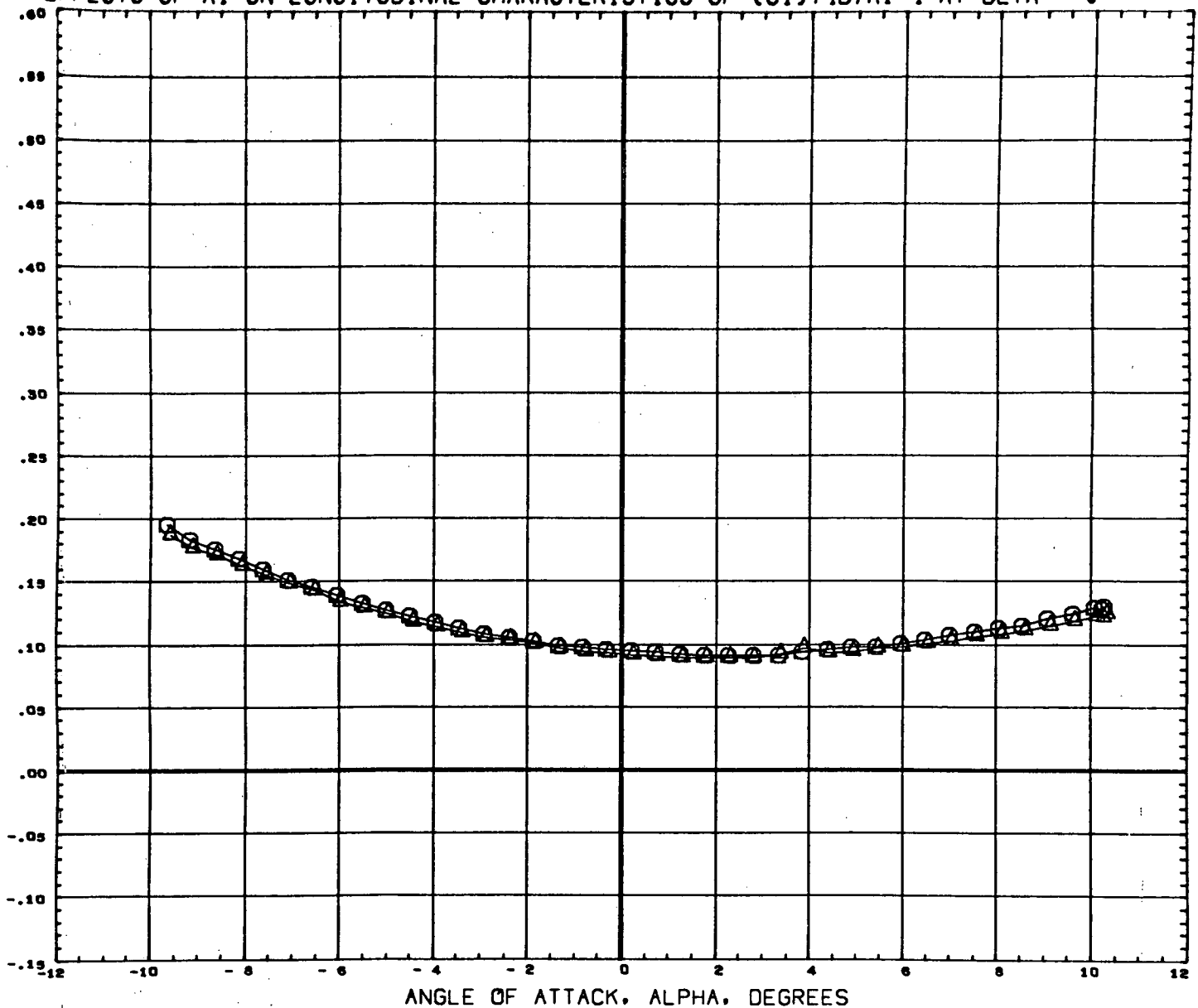
MACH

1.08

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



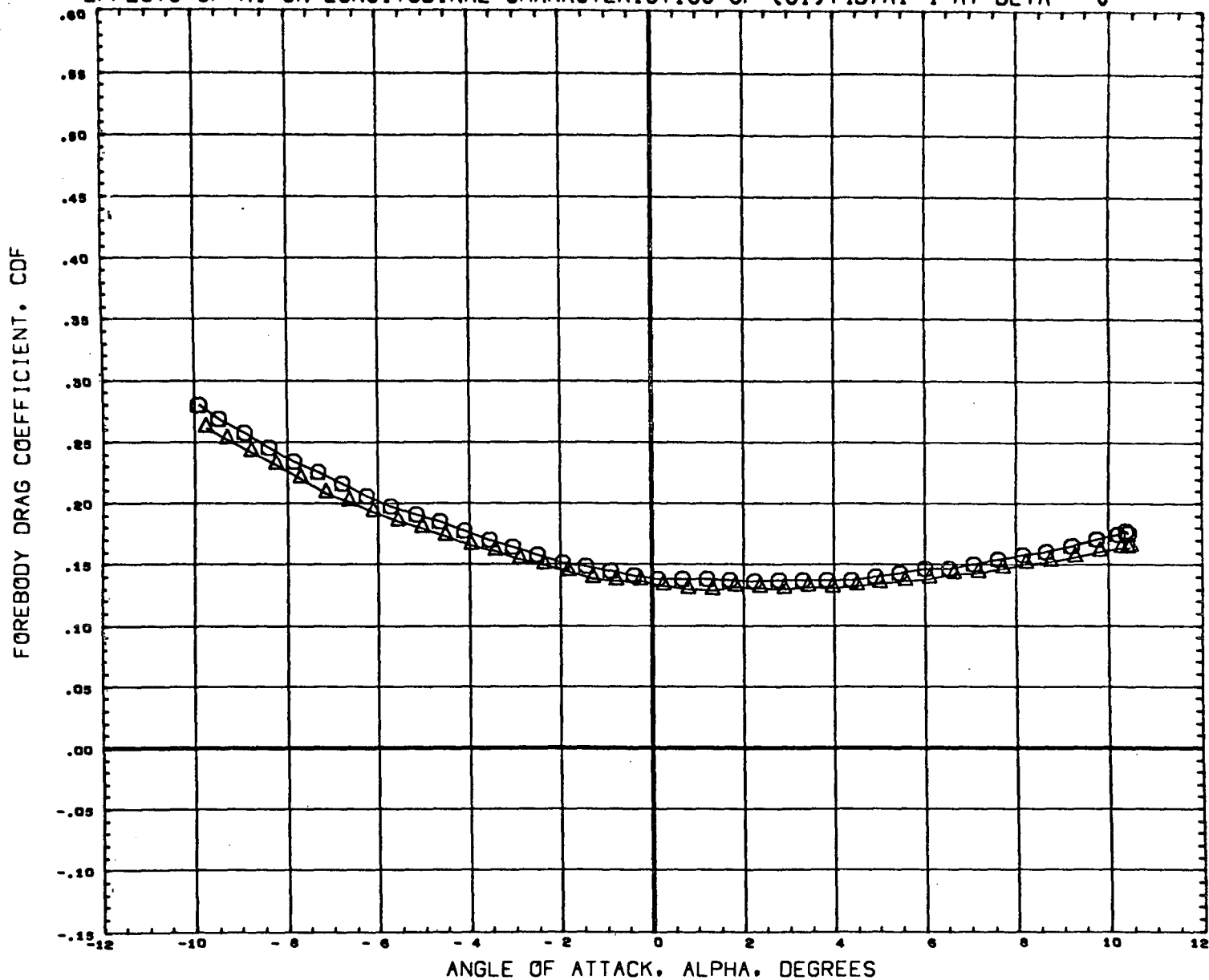
DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74D7) MDAC S-222 COMPOSITE(T-CG) (01)T4B7-4

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-------|--------|--------|--------|-----------------------|-----------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | BREF | 882.0004 | IN. |
| | | | | XMRP | 557.0004 | IN. |
| | | | | YMRP | 0.0000 | IN. |
| | | | | ZMRP | 200.0004 | IN. |
| | | | | SCALE | 0.0060 | SCALE |

MACH .58

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4 AT BETA = 0

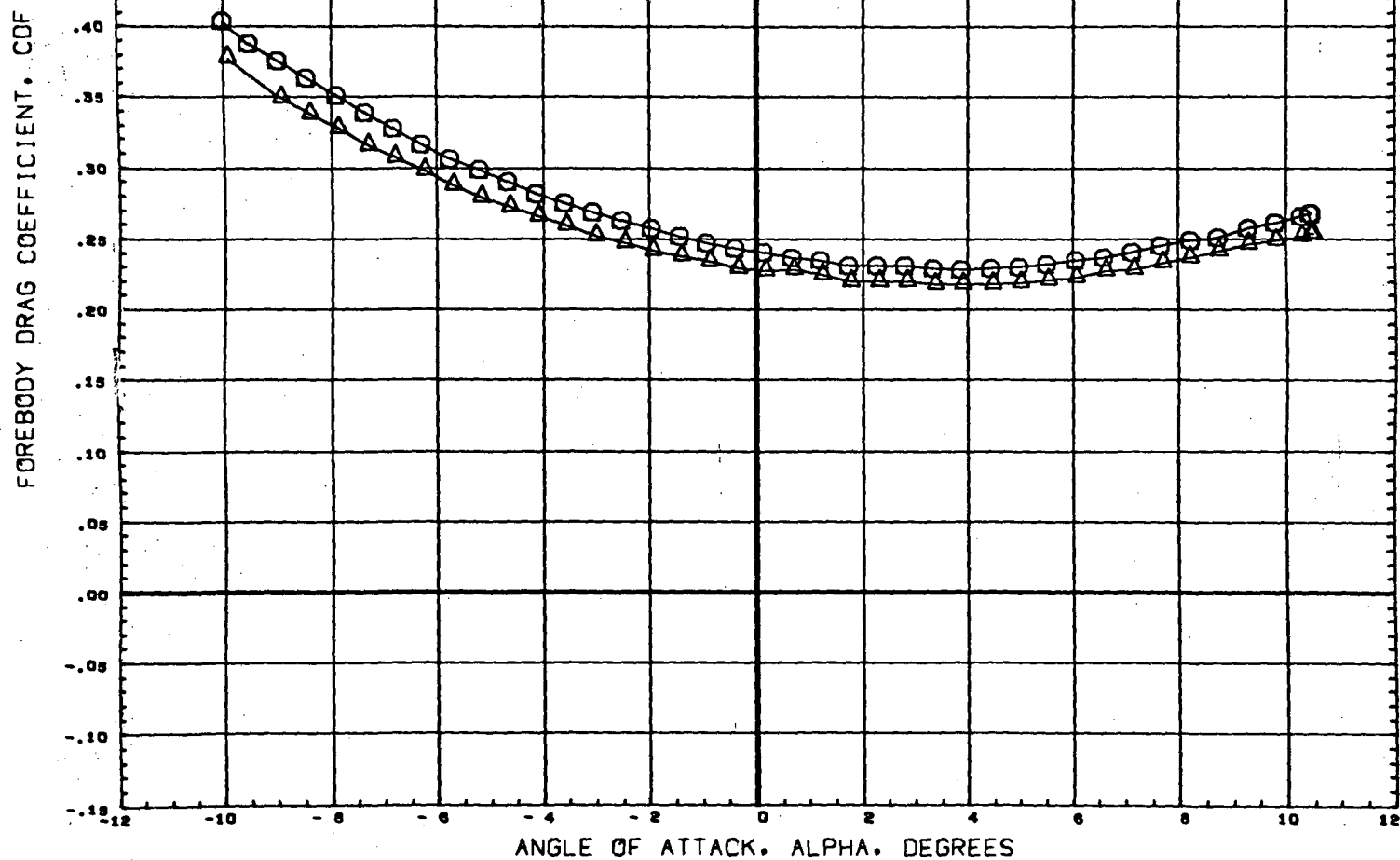


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 862.0004 IN. |
| | | | | | | XMRP | 957.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4 AT BETA = 0

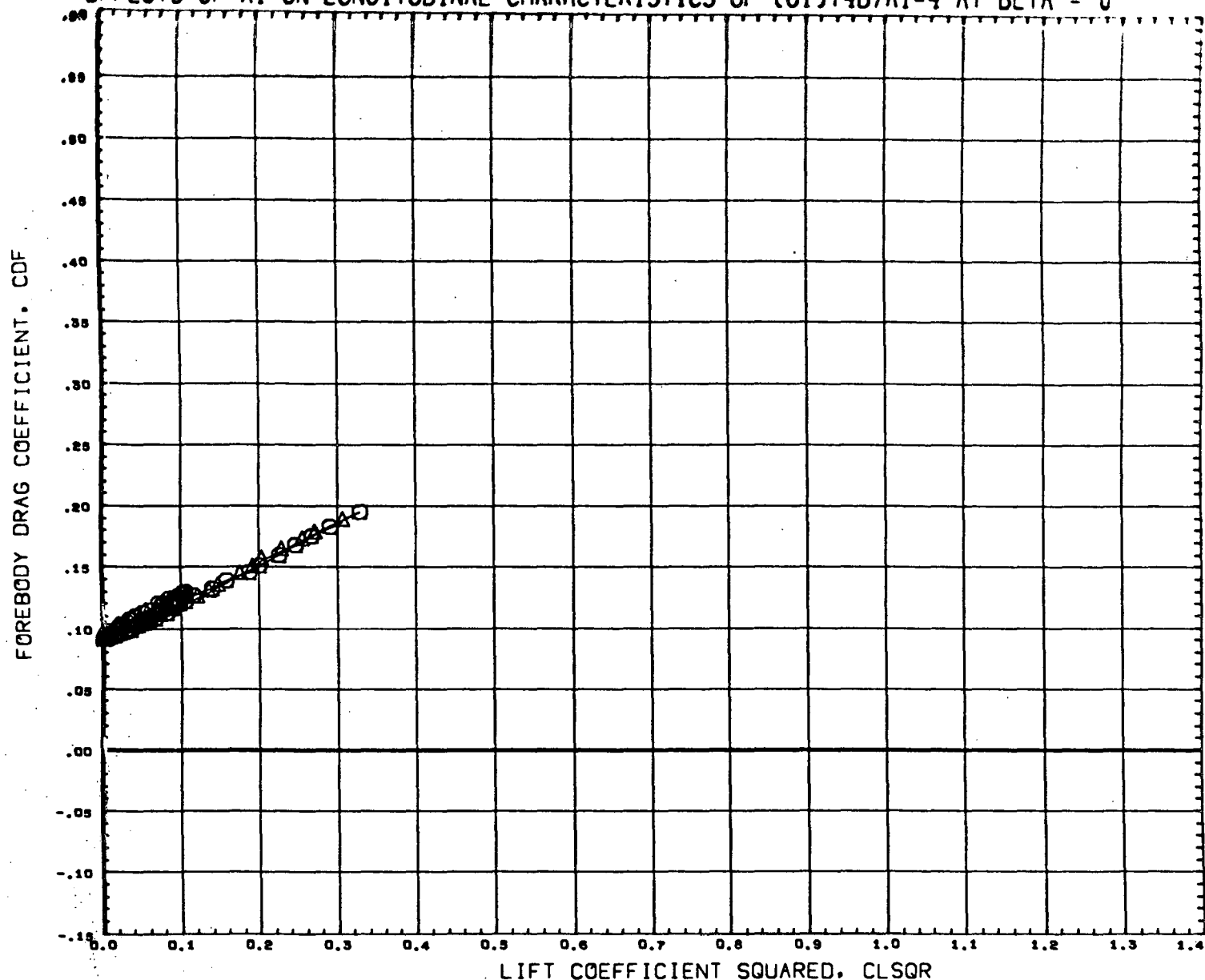


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74D7) MDAC S-222 COMPOSITE(T-CG) (01)T4B7-4

BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

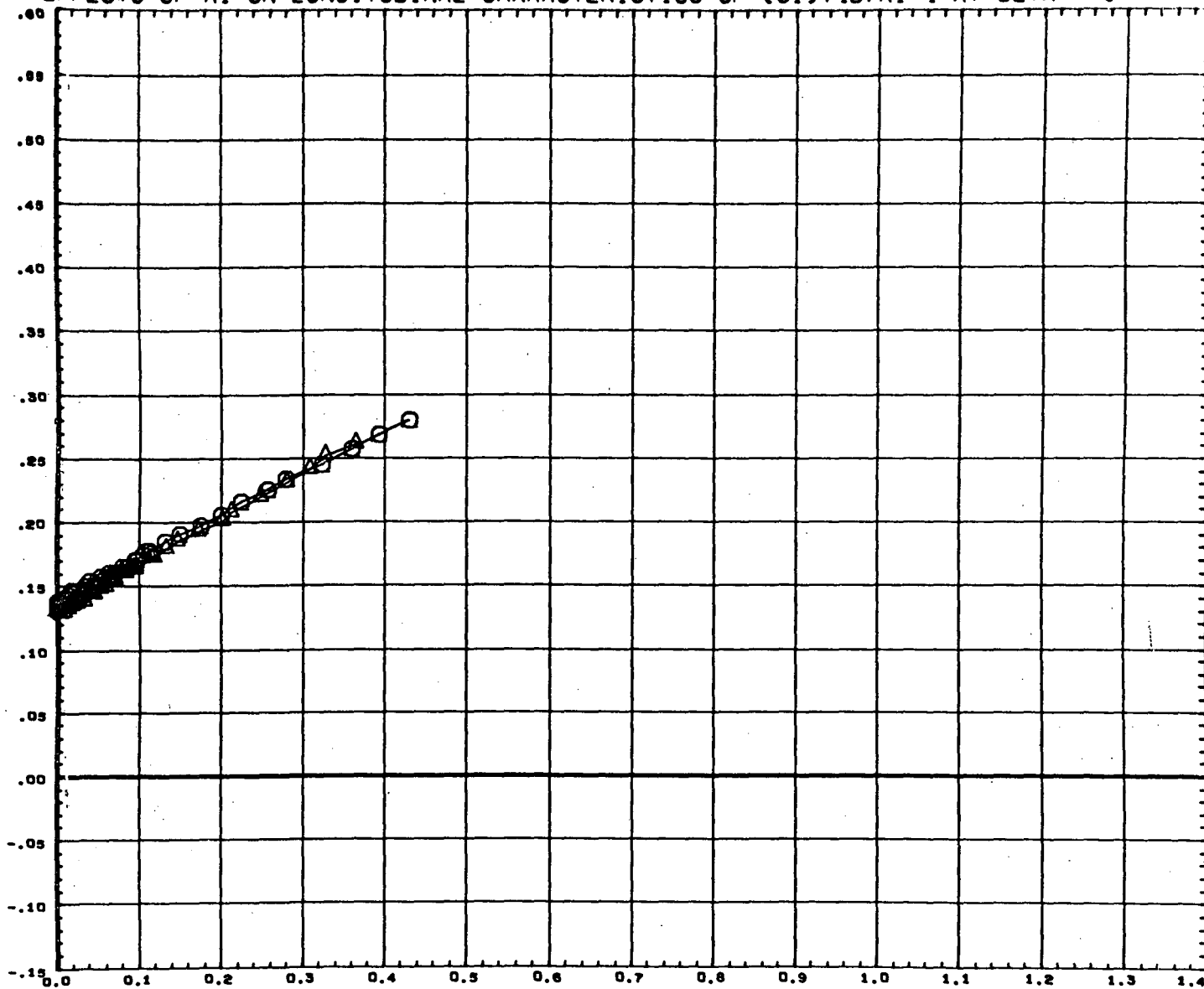
MACH

.58

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



LIFT COEFFICIENT SQUARED, CLSQR

DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74D7) MDAC S-222 COMPOSITE(T-CG) (01)T4B7-4

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

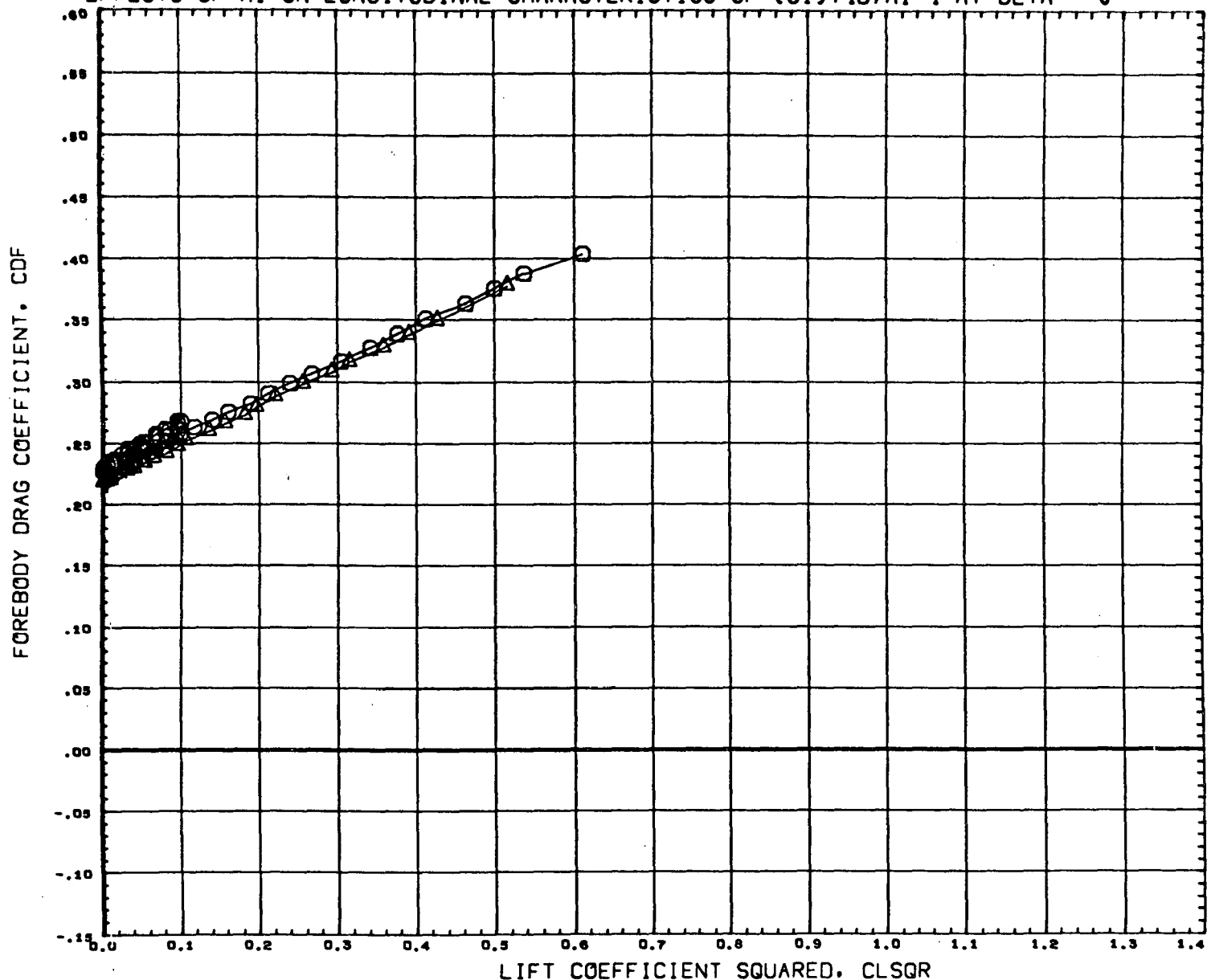
REFERENCE INFORMATION

| | | |
|-------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH .90

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) \bigcirc MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74D7) \triangle MDAC S-222 COMPOSITE(T-CG) (01)T4B7-4

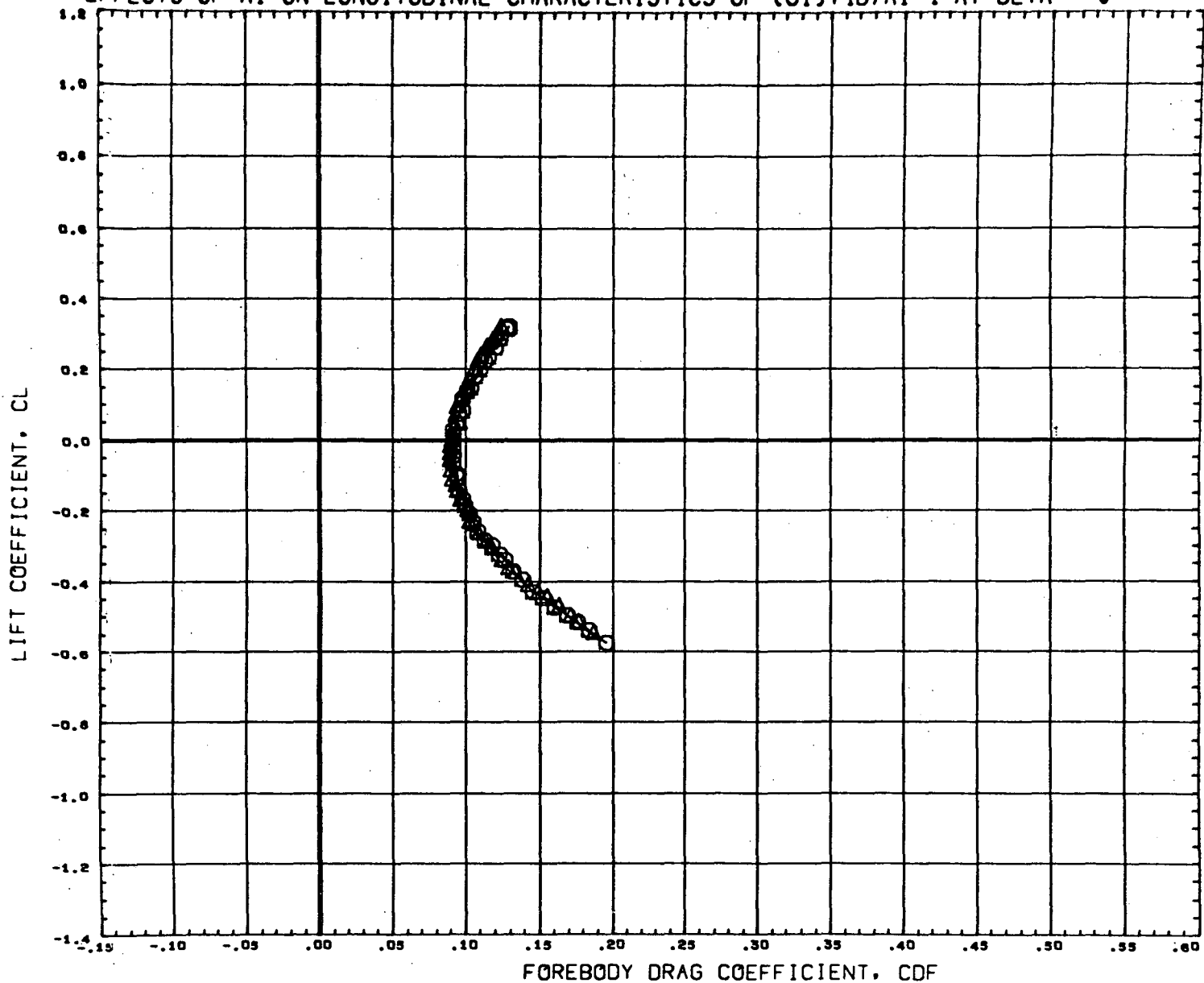
| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3195.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMHP | 557.0004 IN. |
| | | | | YMHP | 0.0000 IN. |
| | | | | ZMHP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH

1.08

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) (01)T4B7A1-4
 (CD74D7) (01)T4B7-4

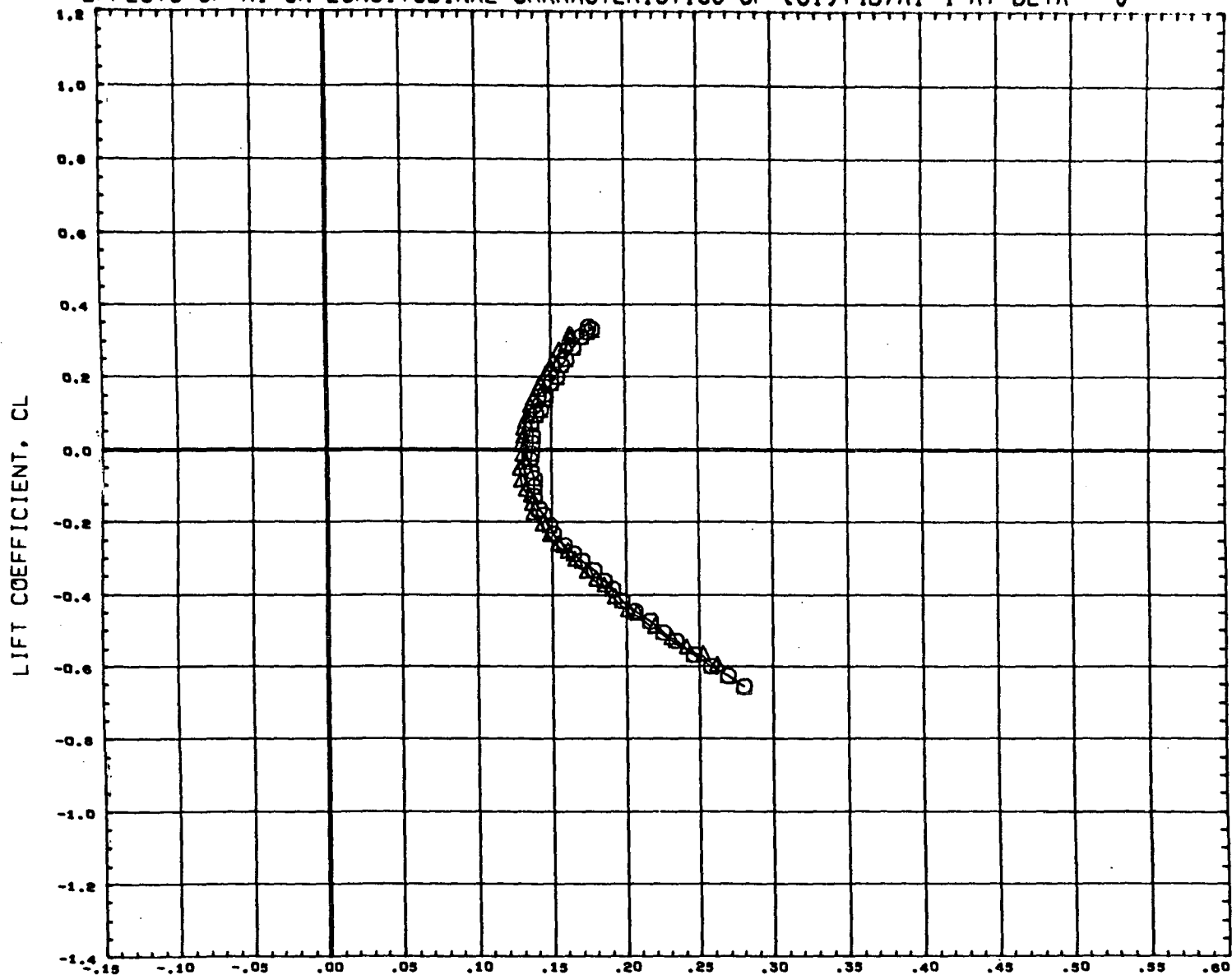
BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH .58

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-4 AT BETA = 0



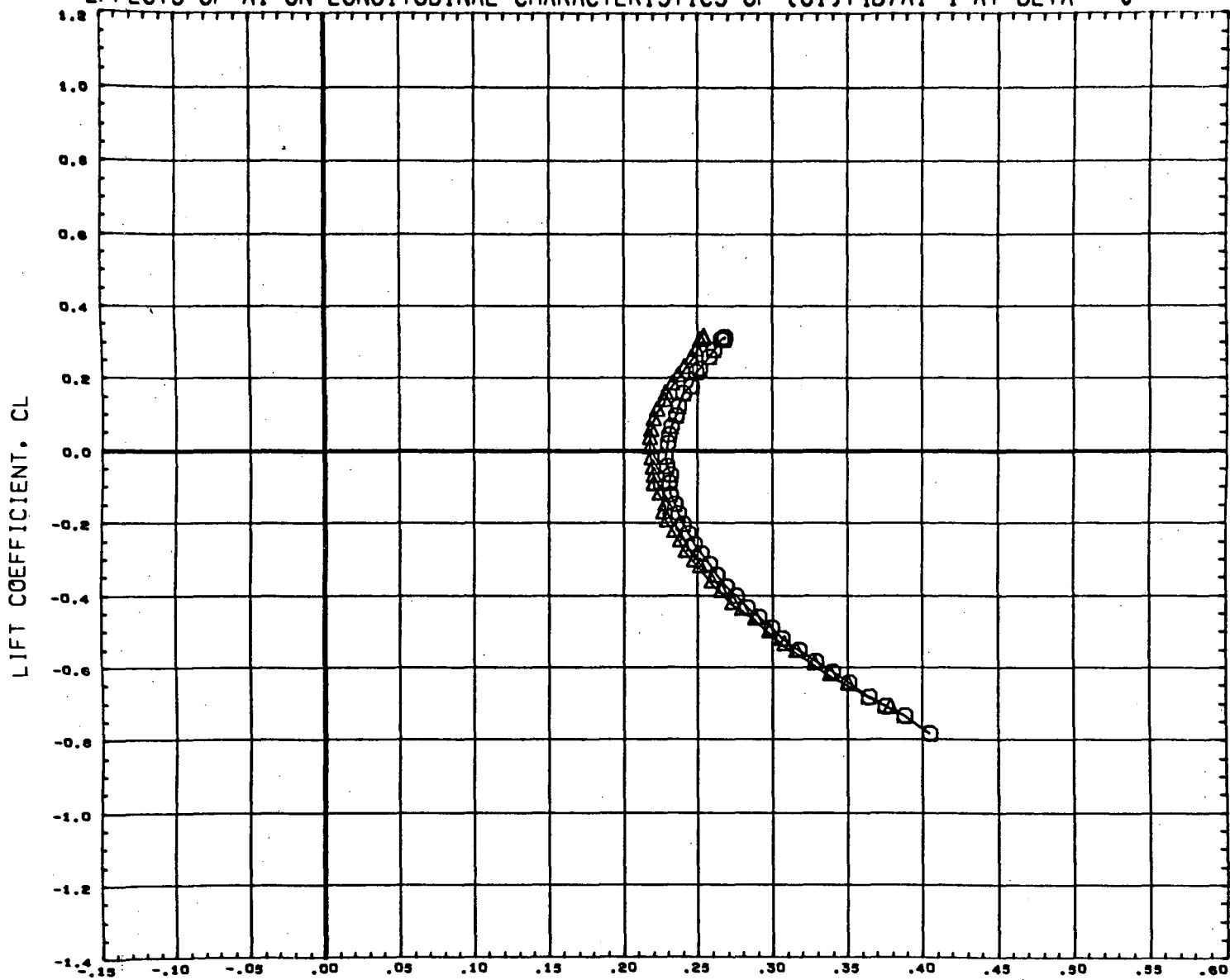
FOREBODY DRAG COEFFICIENT, CDF

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D7) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4 AT BETA = 0



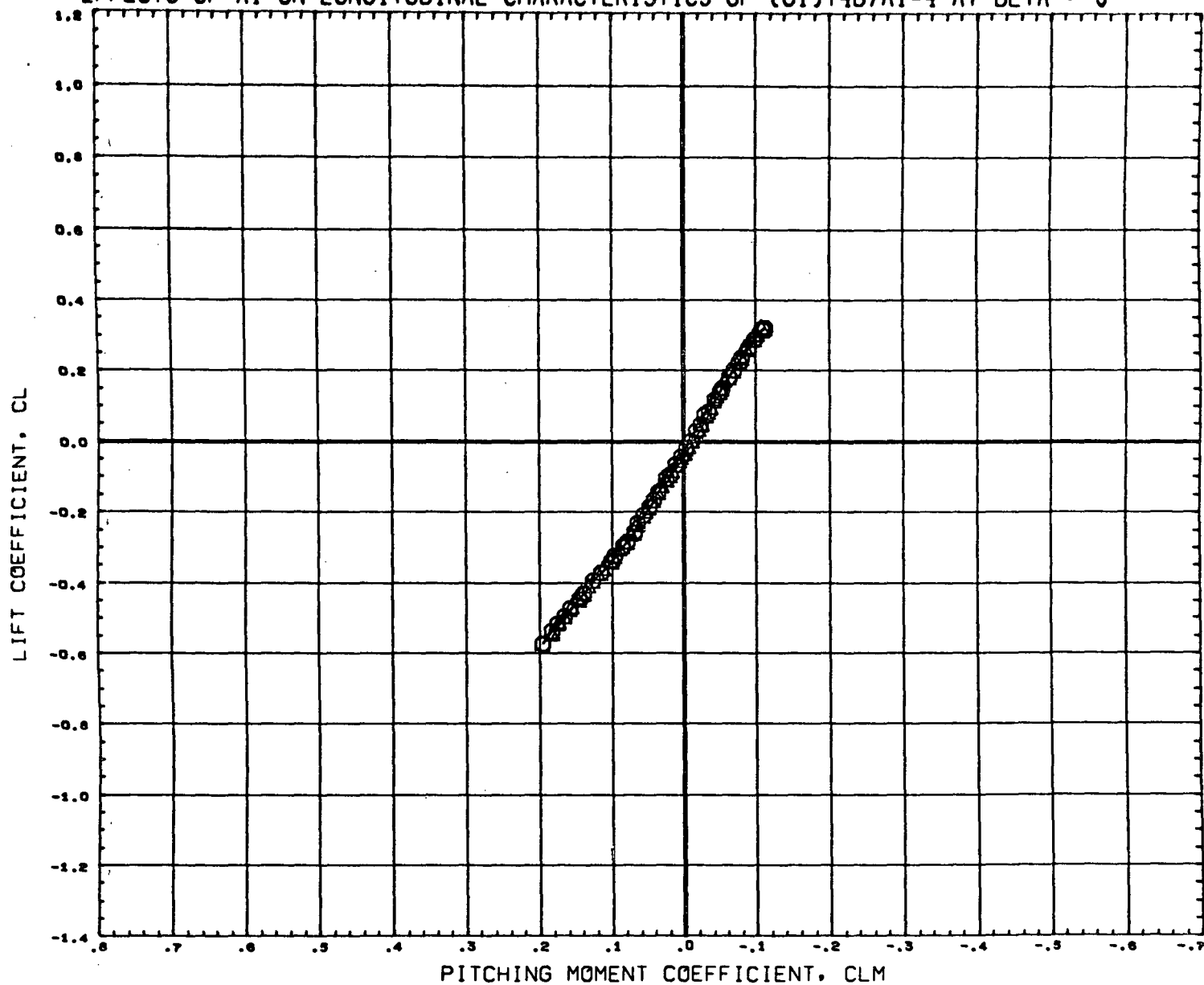
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD74C7) | MDAC S-222 COMPOSITE (T-C6) (01)T4B7A1-4 |
| (CD74D7) | MDAC S-222 COMPOSITE (T-C6) (01)T4B7-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 862.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 1.08

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (01)T487A1-4 AT BETA = 0

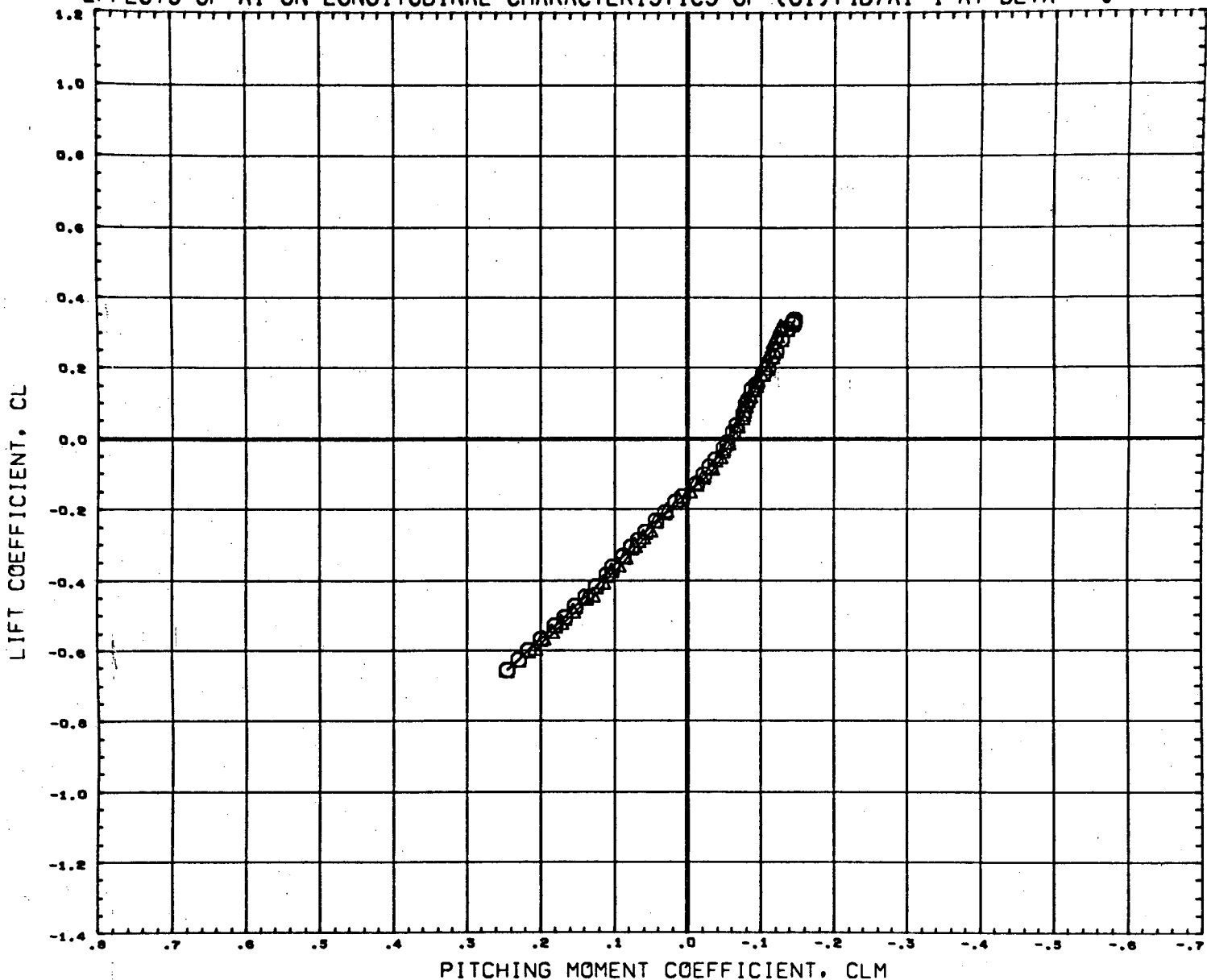


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | Q MDAC S-222 COMPOSITE(T-CG) (01)T487A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D7) | A MDAC S-222 COMPOSITE(T-CG) (01)T487-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4 AT BETA = 0

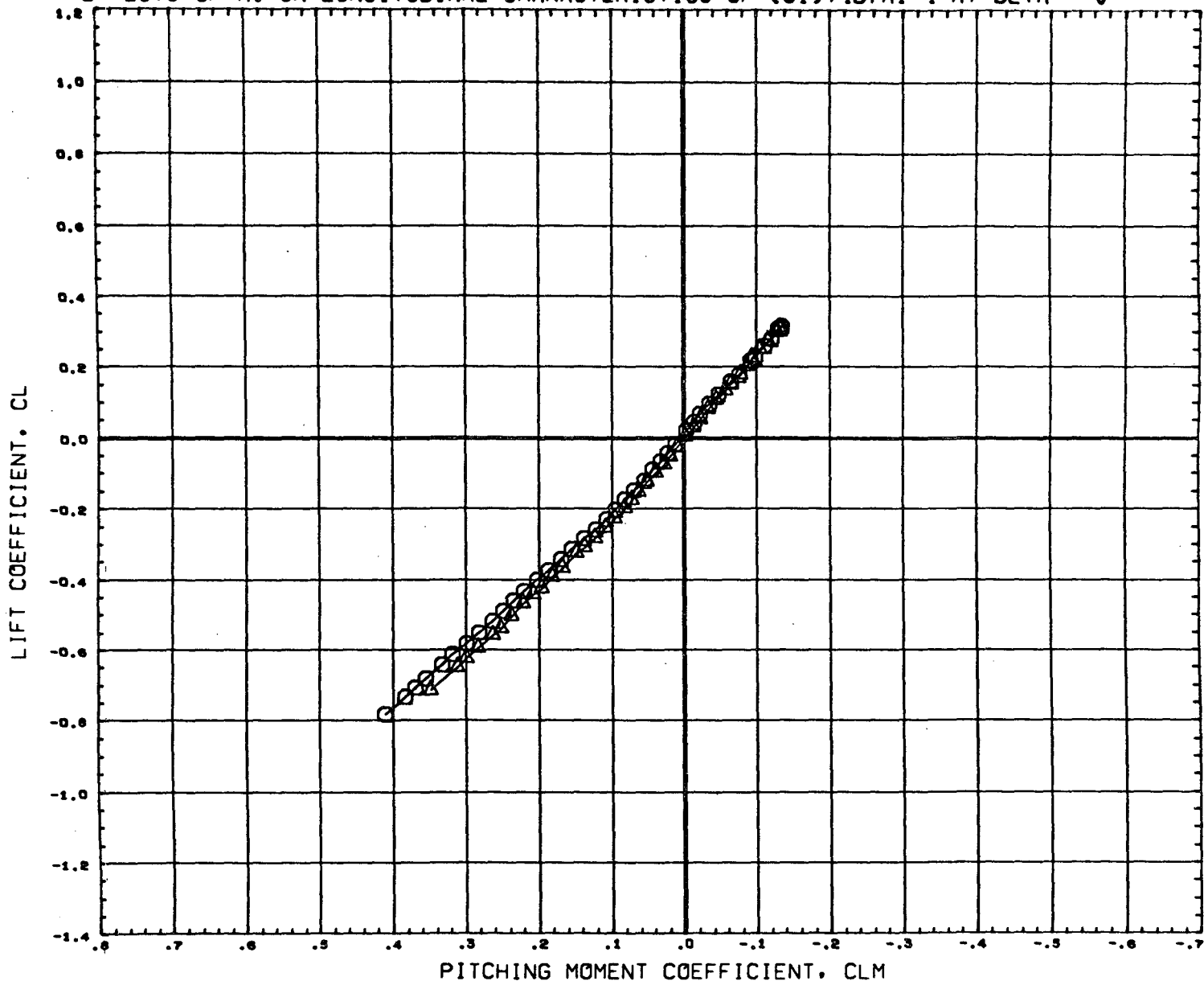


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

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EFFECTS OF A1 ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) \bigcirc MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74D7) \triangle MDAC S-222 COMPOSITE(T-CG) (01)T4B7-4

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | |
|-----------------------|------------------|
| SREF | 3155.3040 SQ.FT. |
| LREF | 609.5004 IN. |
| BREF | 882.0004 IN. |
| XMRP | 557.0004 IN. |
| YMRP | 0.0000 IN. |
| ZMRP | 200.0004 IN. |
| SCALE | 0.0060 SCALE |

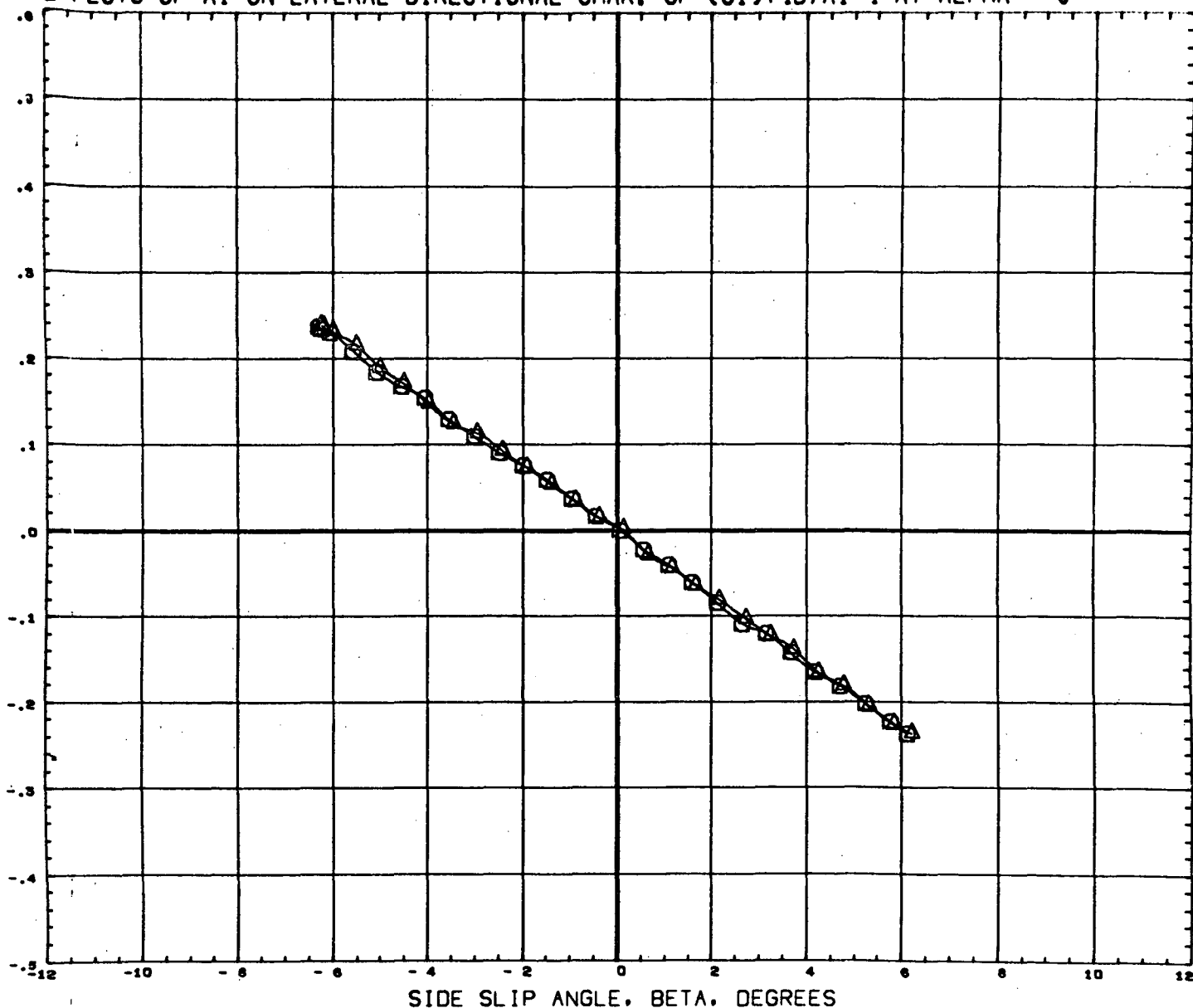
MACH

1.08

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EFFECTS OF A1 ON LATERAL-DIRECTIONAL CHAR. OF (O1)T4B7A1-4 AT ALPHA = 0

LATERAL FORCE COEFFICIENT, CY



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (TD74C8) (O1)T4B7A1-4
 (RD74D8) (O1)T4B7-4

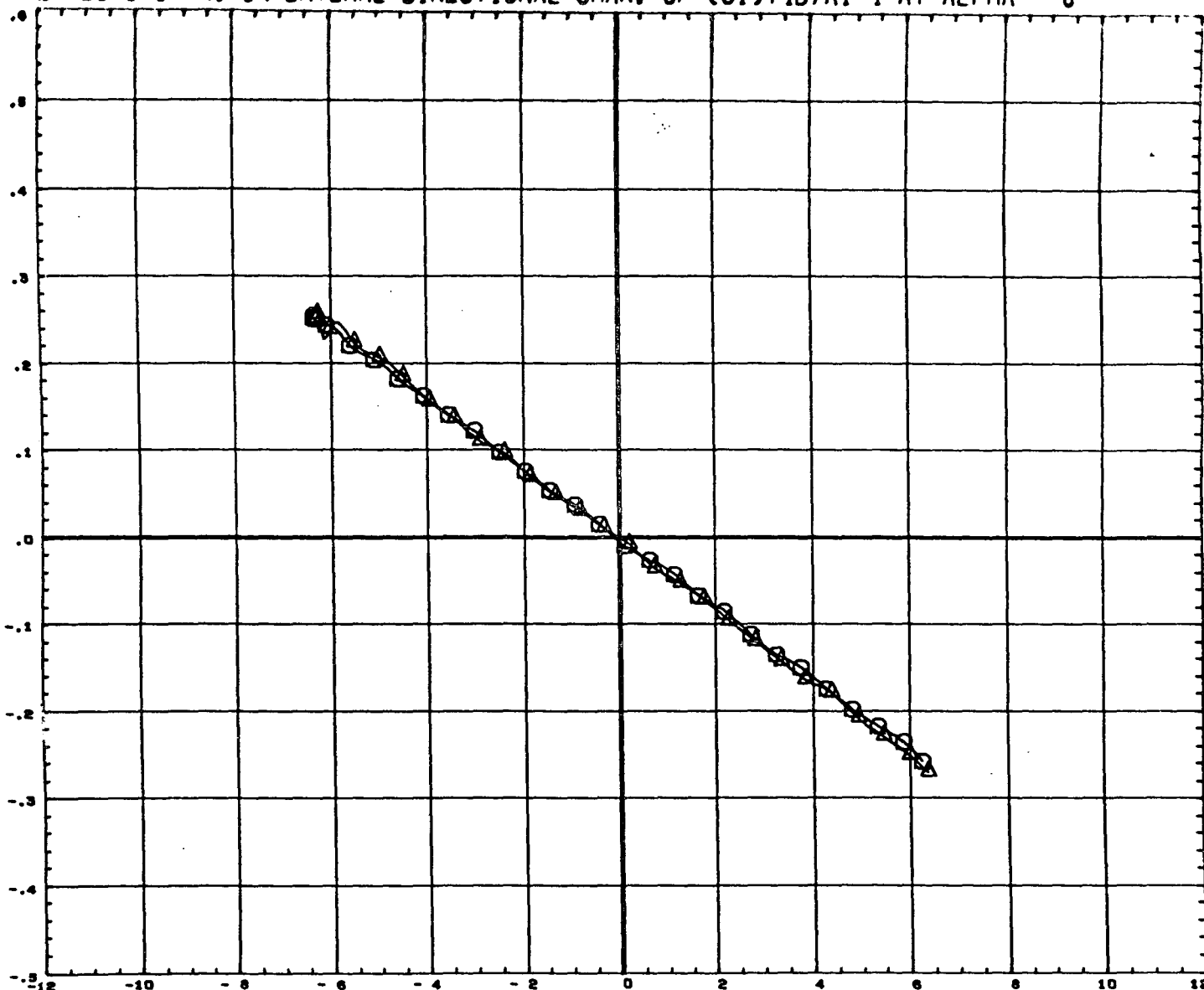
| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 682.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH .58

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EFFECTS OF A1 ON LATERAL-DIRECTIONAL CHAR. OF (O1)T4B7A1-4 AT ALPHA = 0

LATERAL FORCE COEFFICIENT, CY



DATA SET SYMBOL

CONFIGURATION DESCRIPTION

(TD74C8)  MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4
(RD74D8)  MDAC S-222 COMPOSITE (T-CG) (O1)T4B7-4

| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

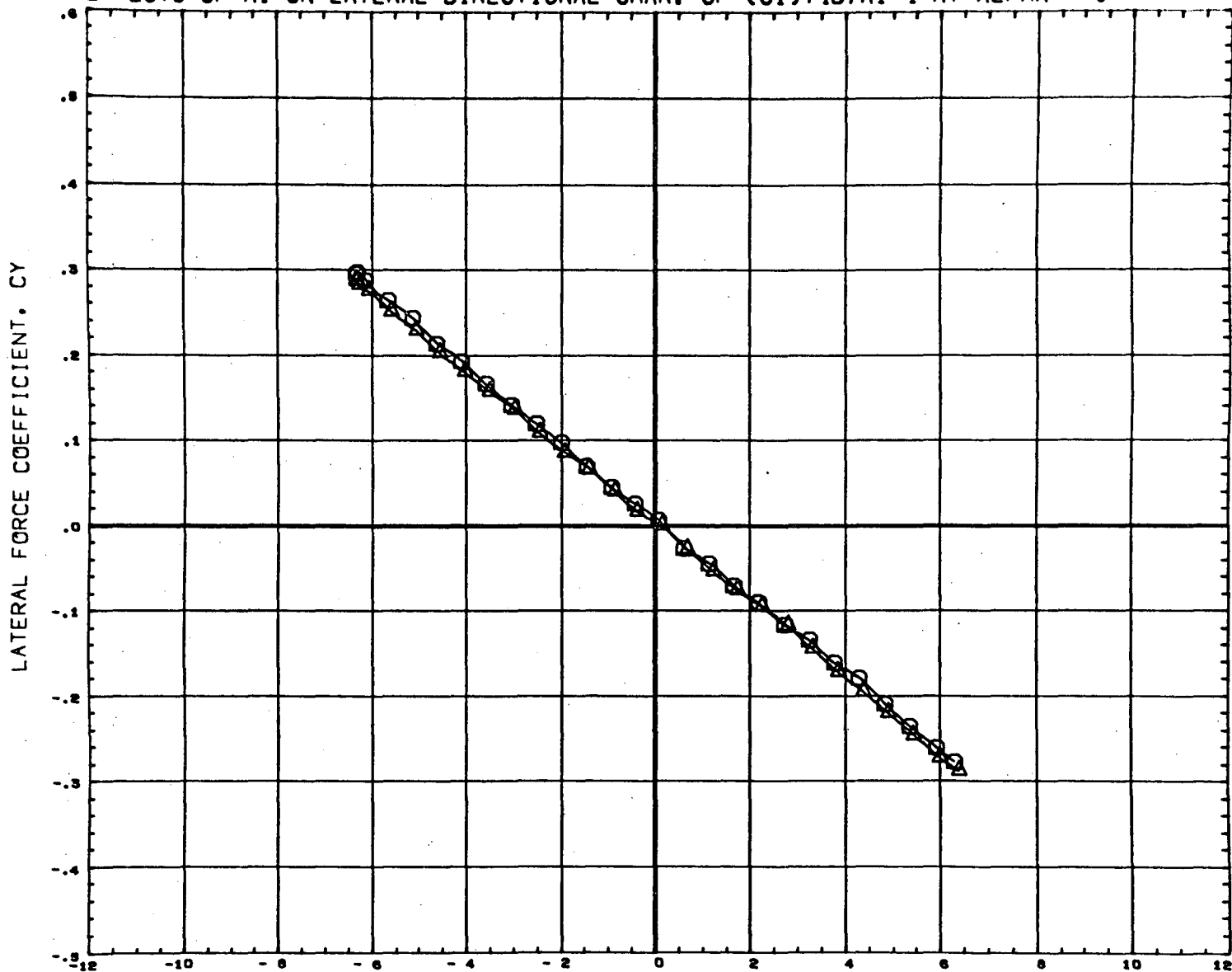
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH



.90

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EFFECTS OF A1 ON LATERAL-DIRECTIONAL CHAR. OF (01)T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C8)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
 (RD74D8)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7-4

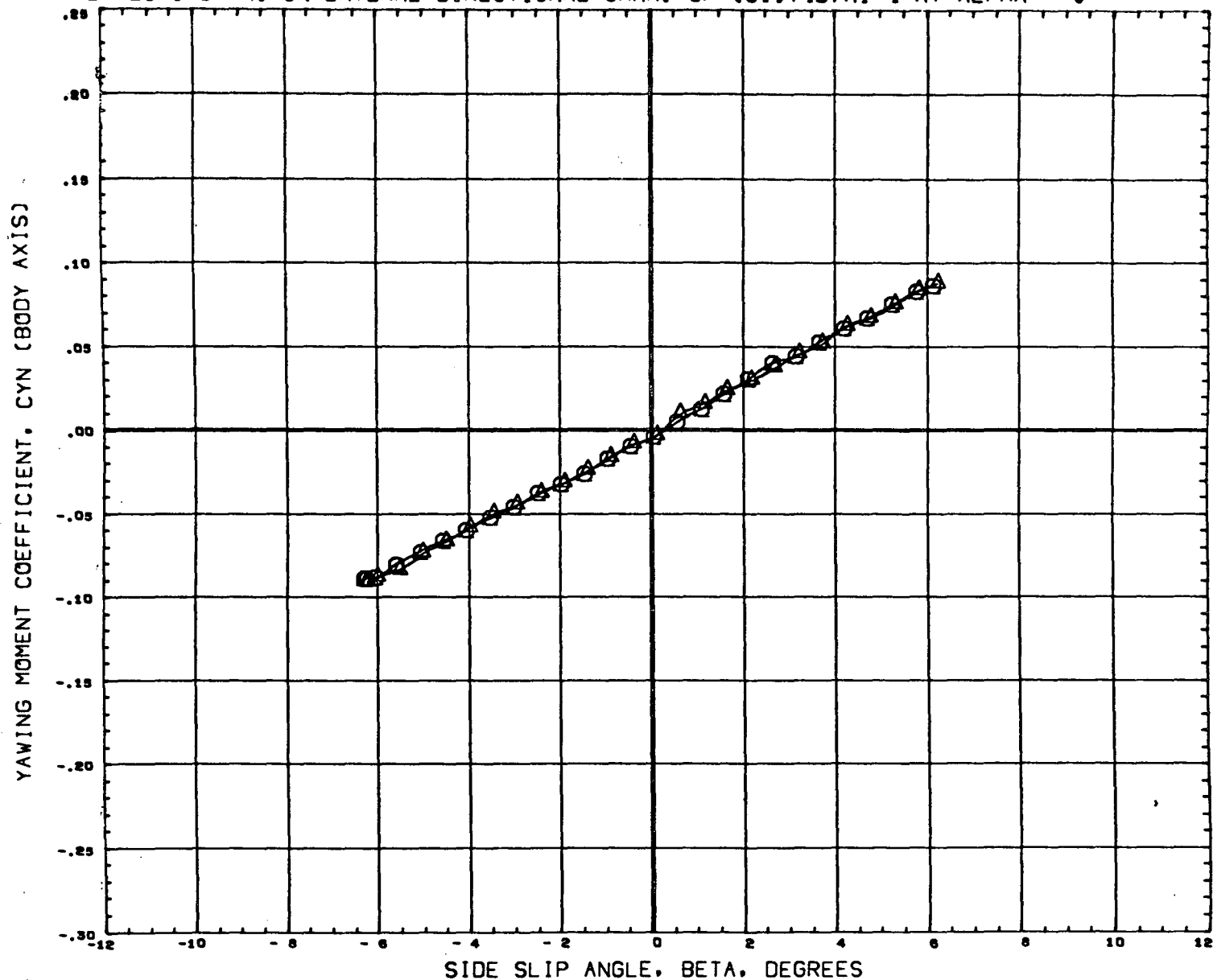
| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 662.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 1.08

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EFFECTS OF A1 ON LATERAL-DIRECTIONAL CHAR. OF (01)T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (TD74C8) (01)T4B7A1-4
 (RD74D8) (01)T4B7-4

ALPHA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

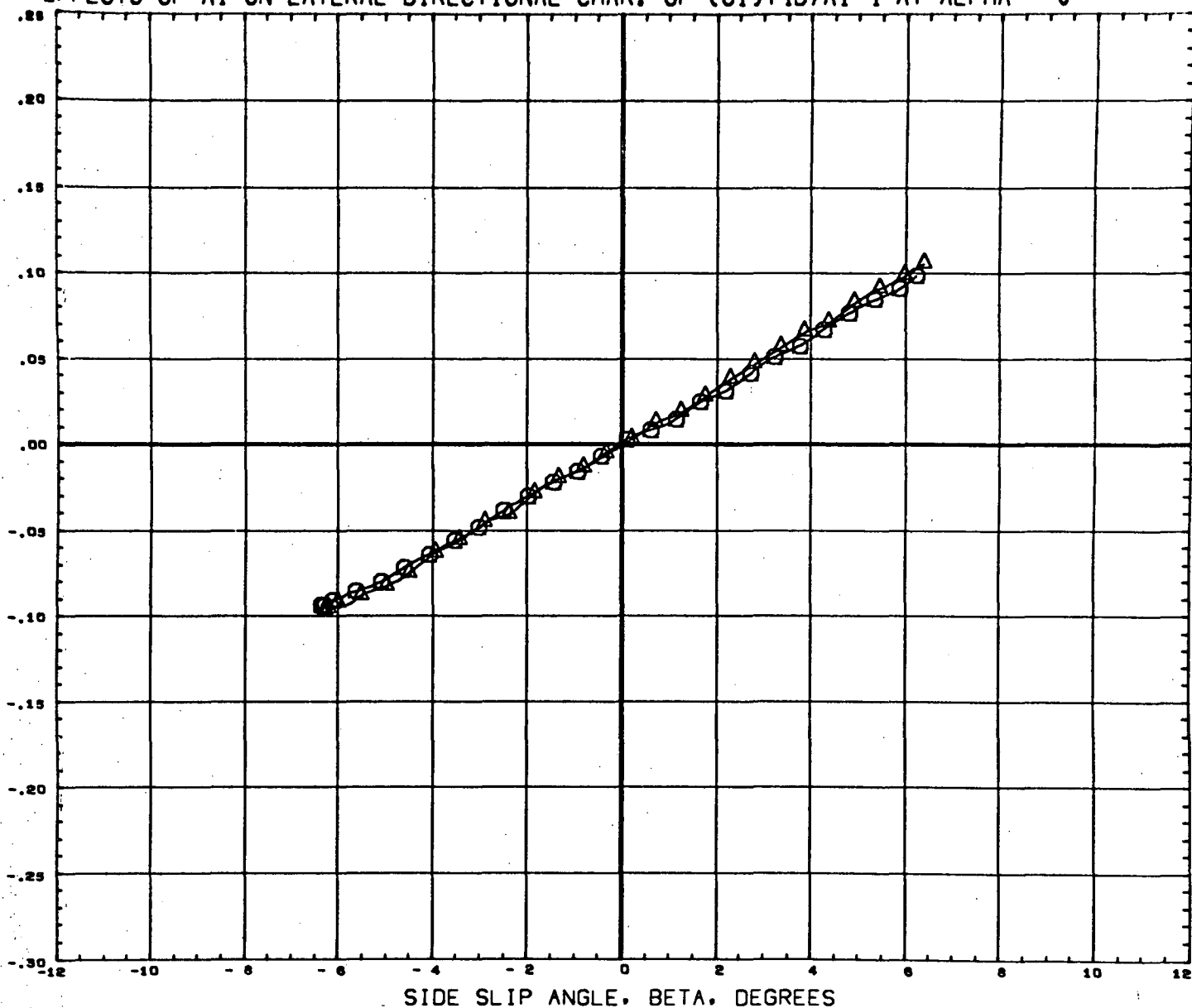
MACH

.58

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EFFECTS OF A1 ON LATERAL-DIRECTIONAL CHAR. OF (O1)T4B7A1-4 AT ALPHA = 0

YAWING MOMENT COEFFICIENT, CYN (BODY AXIS)



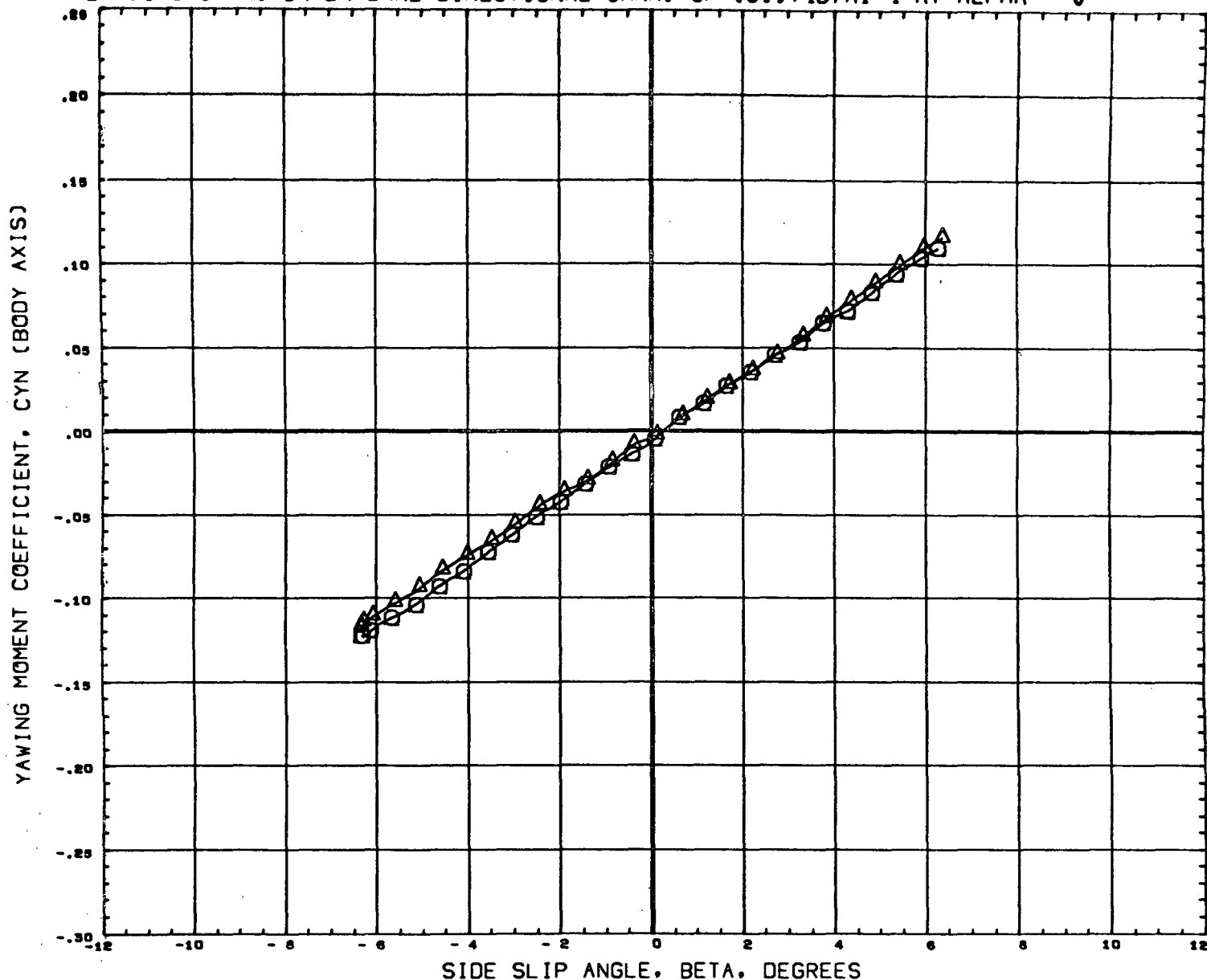
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (TD74C8) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 |
| (RD74D8) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7-4 |

| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH .90

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EFFECTS OF A1 ON LATERAL-DIRECTIONAL CHAR. OF (01)T4B7A1-4 AT ALPHA = 0



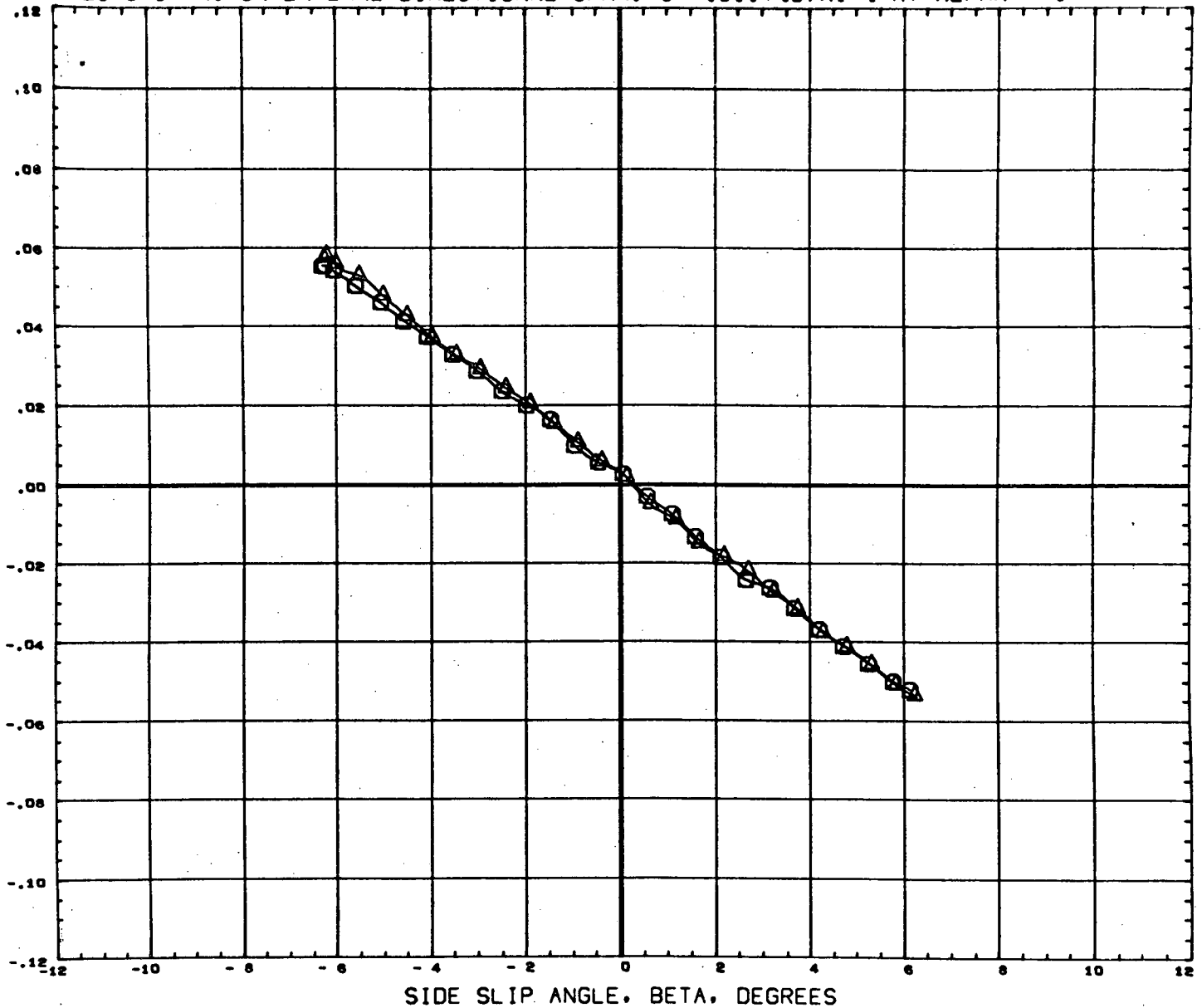
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

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EFFECTS OF A1 ON LATERAL-DIRECTIONAL CHAR. OF (01)T4B7A1-4 AT ALPHA = 0

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



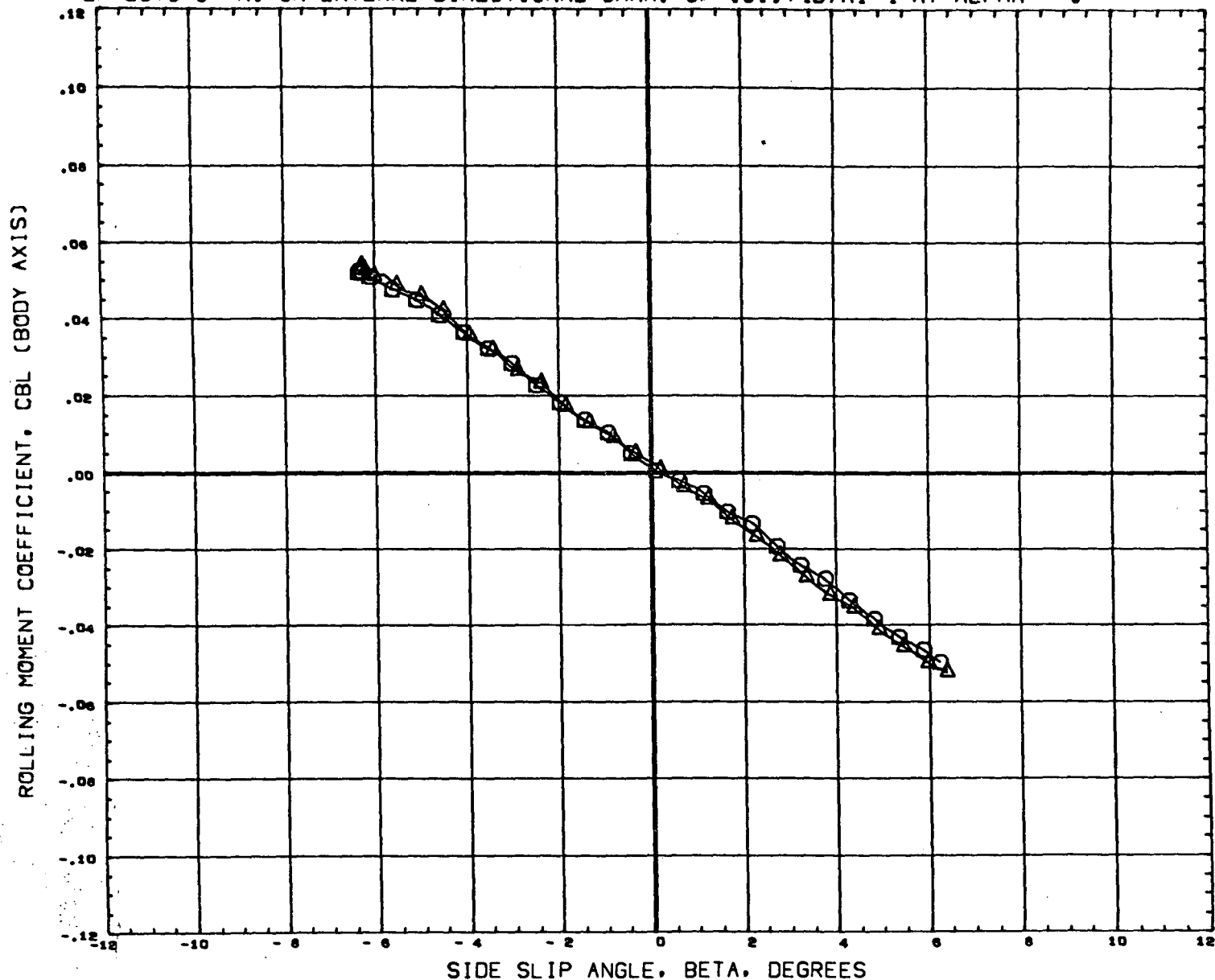
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (RD74D8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7-4 |

| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 862.0004 IN. |
| | | | | XMRF 557.0004 IN. |
| | | | | YMRF 0.0000 IN. |
| | | | | ZMRF 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH .58

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EFFECTS OF A1 ON LATERAL-DIRECTIONAL CHAR. OF (O1)T4B7A1-4 AT ALPHA = 0

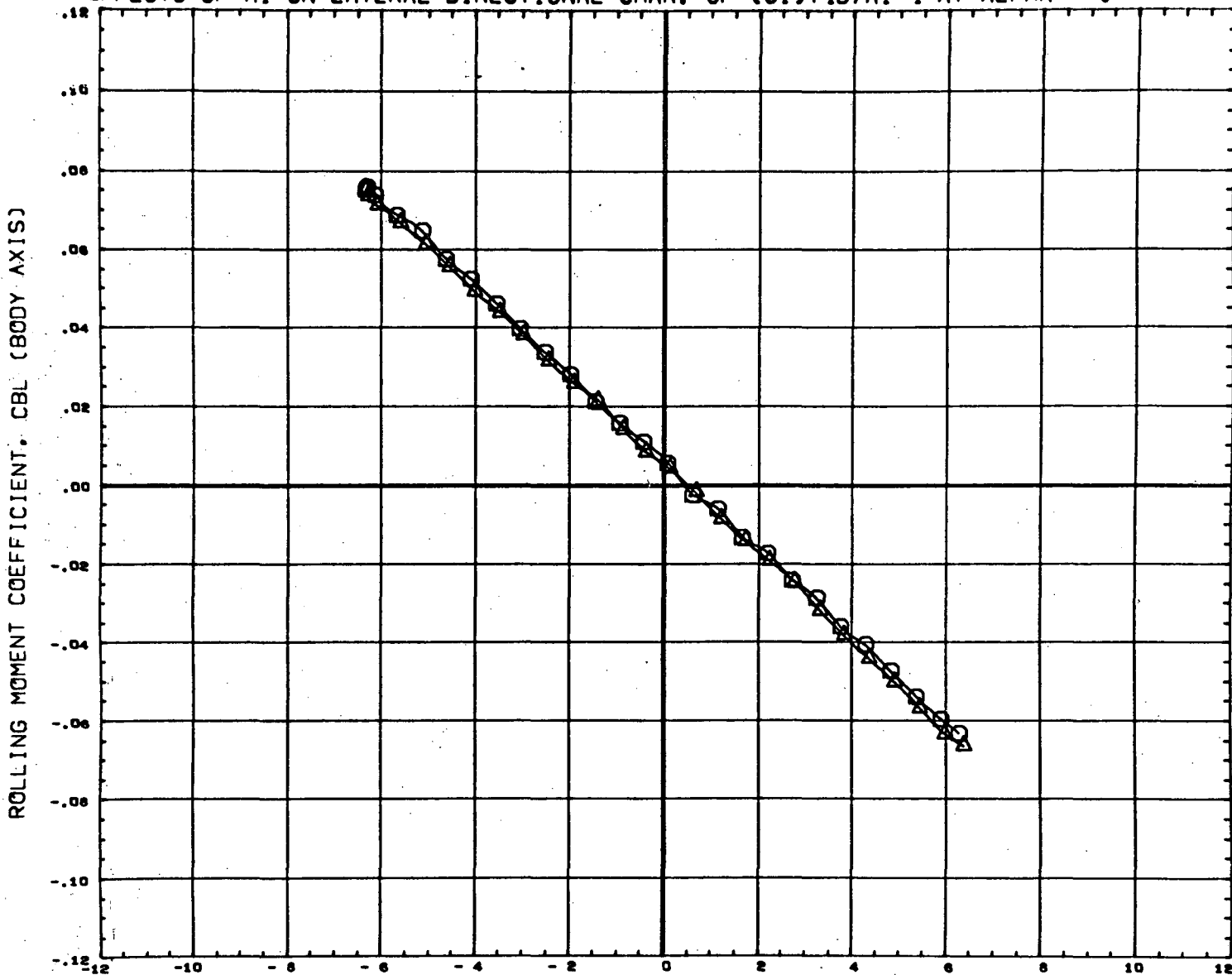




| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D8) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

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EFFECTS OF A1 ON LATERAL-DIRECTIONAL CHAR. OF (01)T4B7A1-4 AT ALPHA = 0



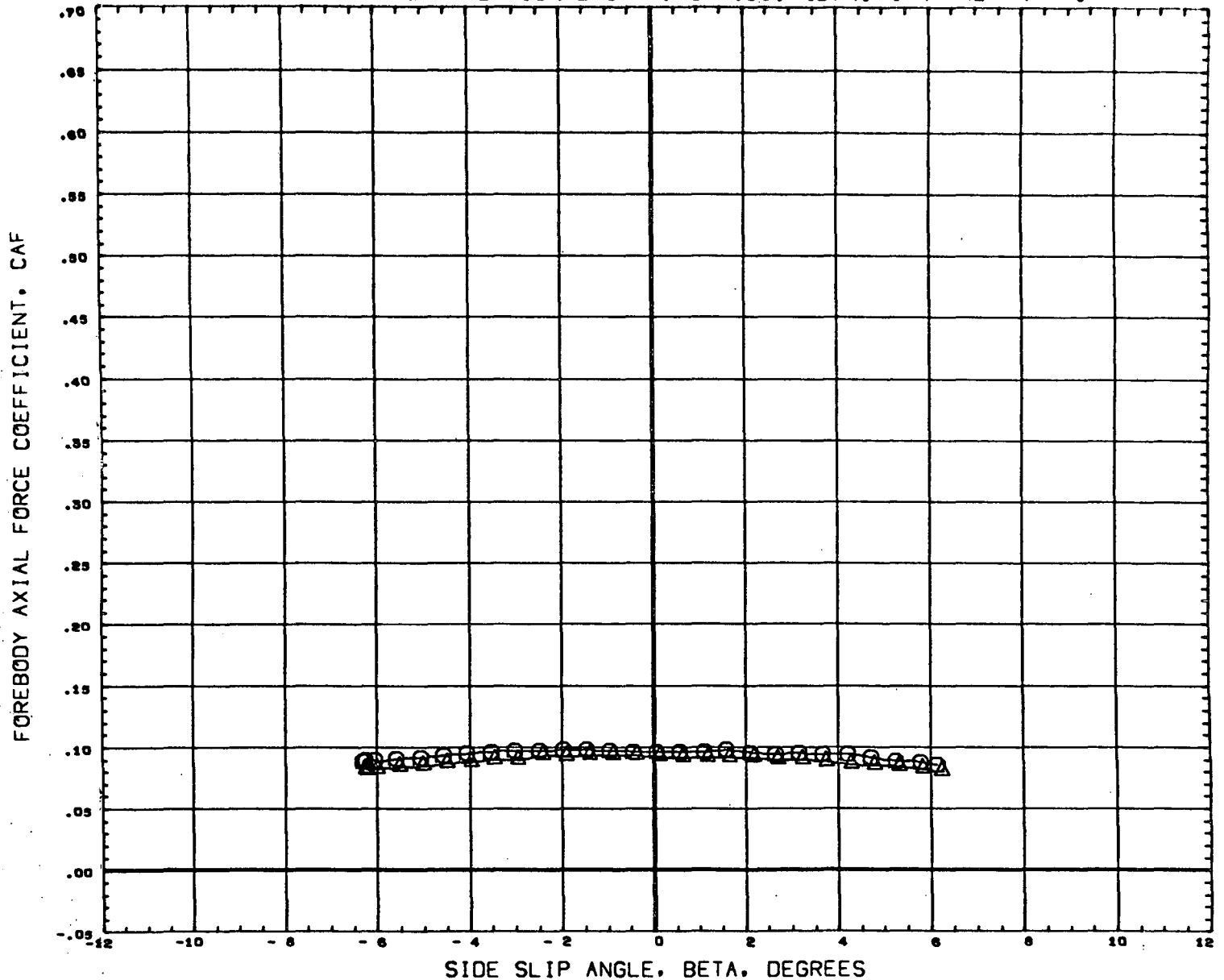
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|--|---|
| (TD74C8)  | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (RD74D8)  | MDAC S-222 COMPOSITE(T-CG) (01)T4B7-4 |

| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH 1.08

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EFFECTS OF A1 ON LATERAL-DIRECTIONAL CHAR. OF (01)T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (TD74C8) Q MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (RD74D8) A MDAC S-222 COMPOSITE(T-CG) (01)T4B7-4

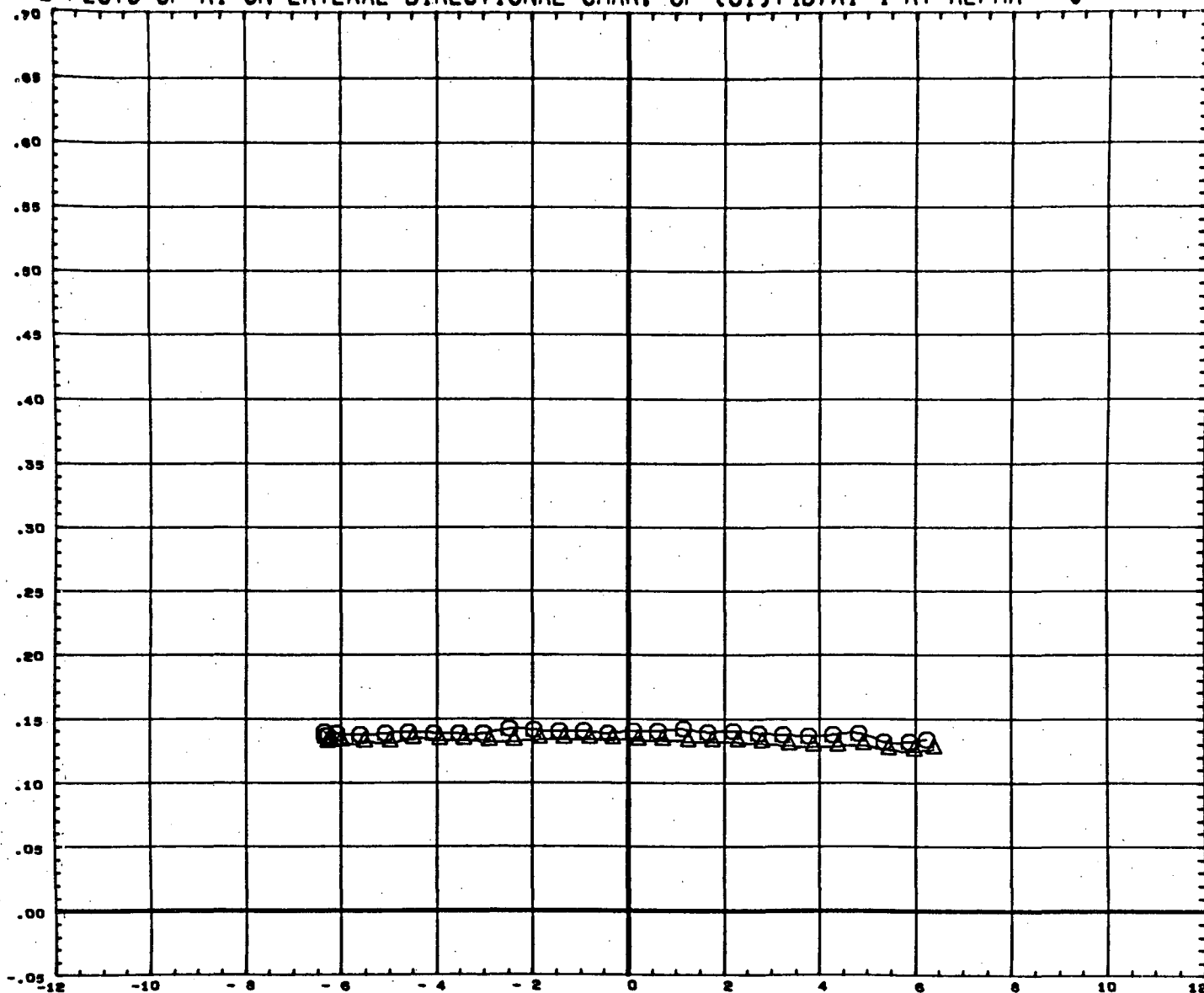
| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0080 SCALE |

MACH .58

PAGE 312

EFFECTS OF A1 ON LATERAL-DIRECTIONAL CHAR. OF (O1)T4B7A1-4 AT ALPHA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



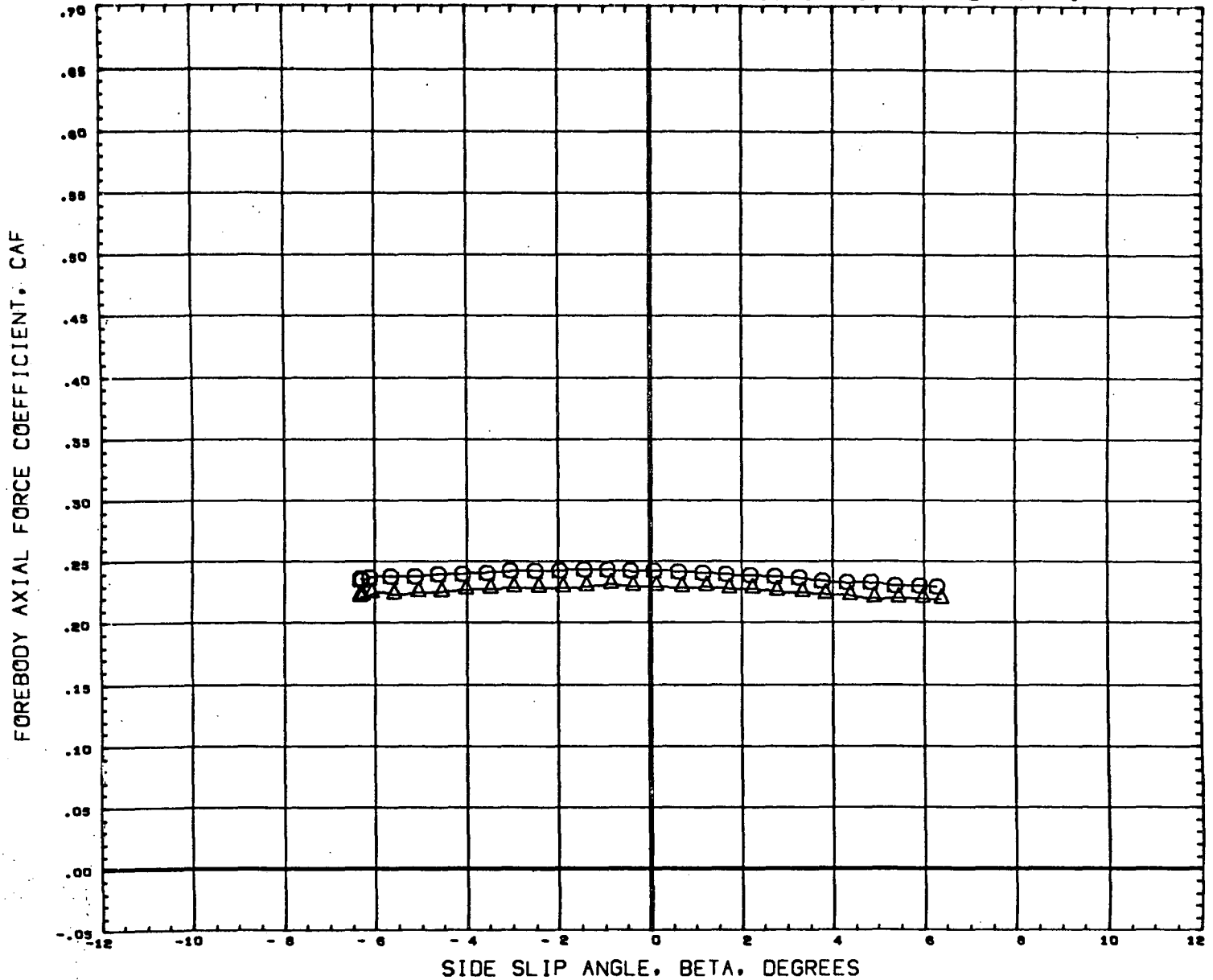
SIDE SLIP ANGLE, BETA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | NDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74D8) | NDAC S-222 COMPOSITE (T-CG) (O1)T4B7-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

PAGE 313

EFFECTS OF A1 ON LATERAL-DIRECTIONAL CHAR. OF (01)T4B7A1-4 AT ALPHA = 0



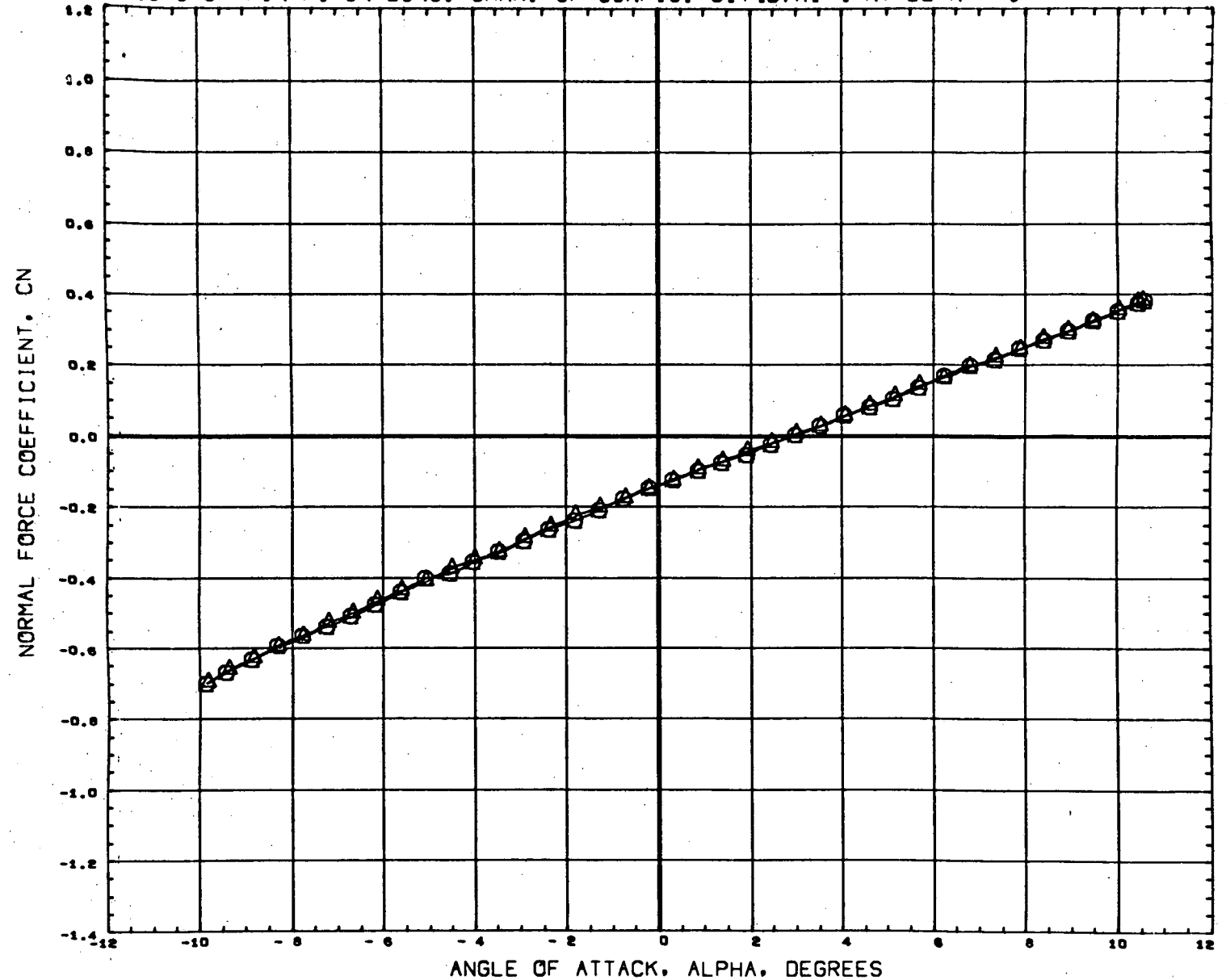
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-----------------|---|-------|--------|--------|--------|-----------------------|-----------|--------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| (RD74D8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | | | BREF | 882.0004 | IN. |
| | | | | | | XMRP | 557.0004 | IN. |
| | | | | | | YMRP | 0.0000 | IN. |
| | | | | | | ZMRP | 200.0004 | IN. |
| | | | | | | SCALE | 0.0080 | SCALE |

MACH

1.08

PAGE 314

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. 01T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|--|---|
| (CD7572)  | MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4 |
| (CD7586)  | MDAC S-222 COMPOSITE(T-CG) 01T4F1B7A1-4 |

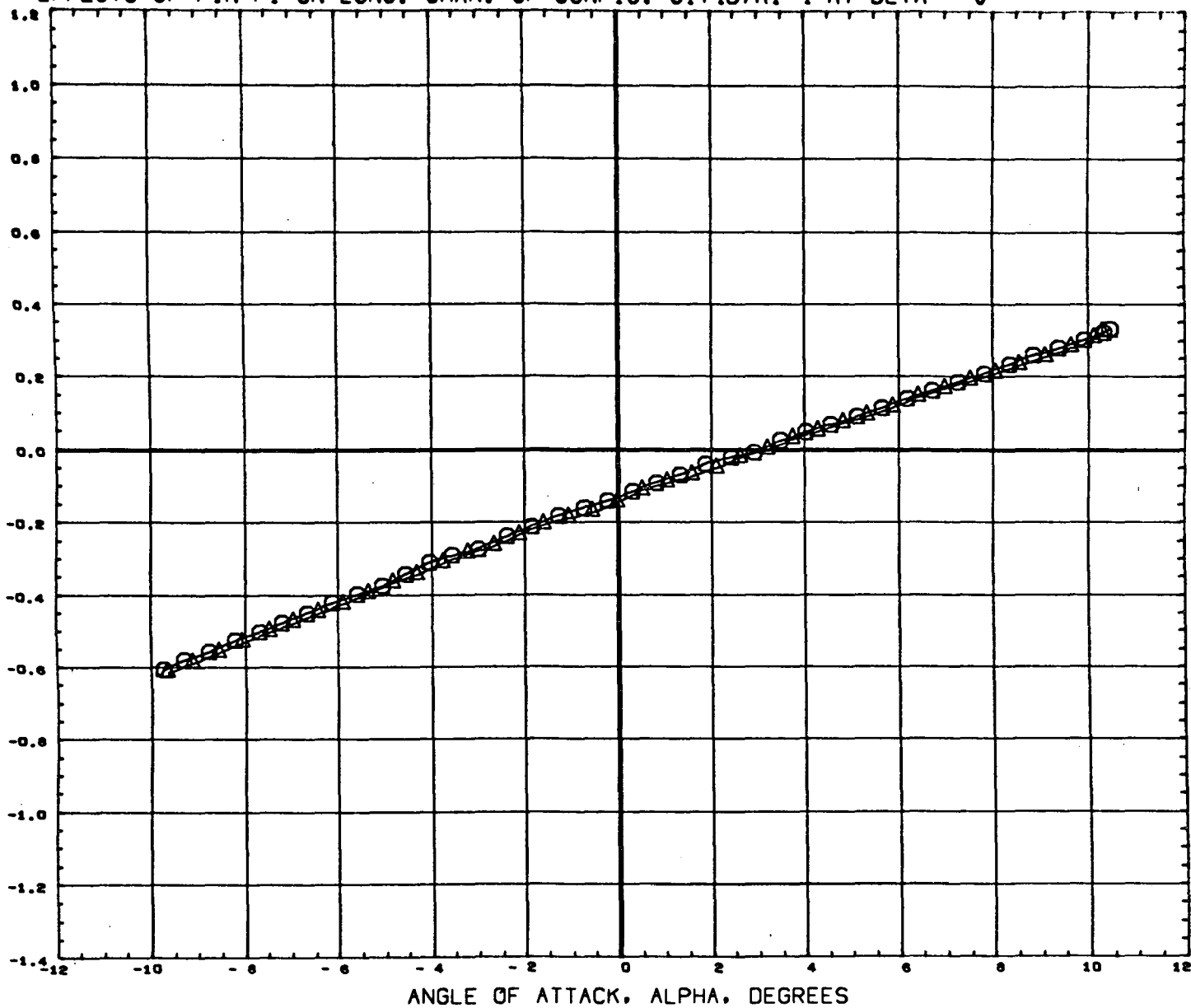
| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 |

MACH 1.51

PAGE 315

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. 01T4B7A1-4 AT BETA = 0

NORMAL FORCE COEFFICIENT, CN



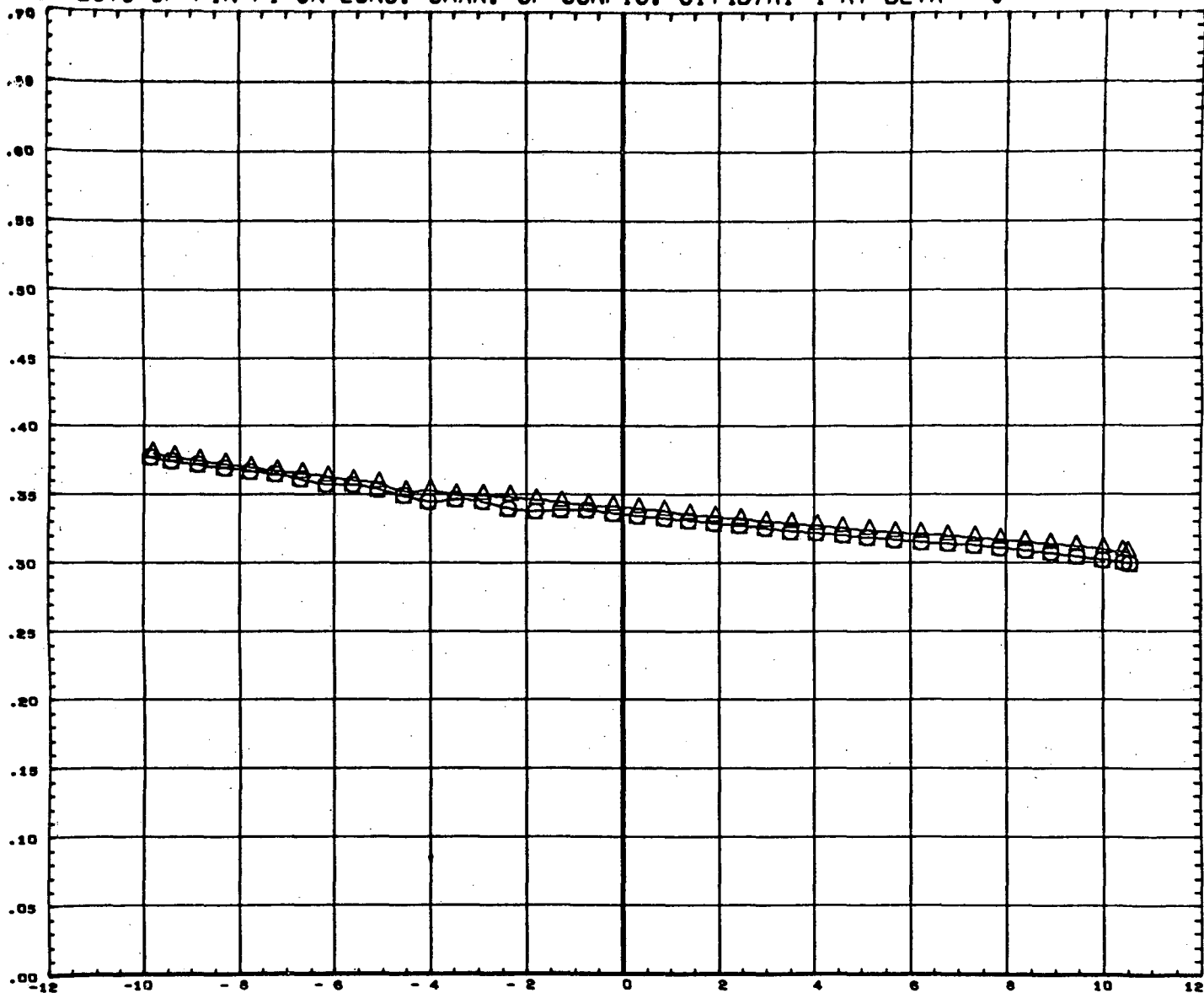
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD7572) | MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD7586) | MDAC S-222 COMPOSITE(T-CG) 01T4F187A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 |

MACH 2.20

PAGE 316

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. 01T4B7A1-4 AT BETA = 0

AXIAL FORCE COEFFICIENT, CA

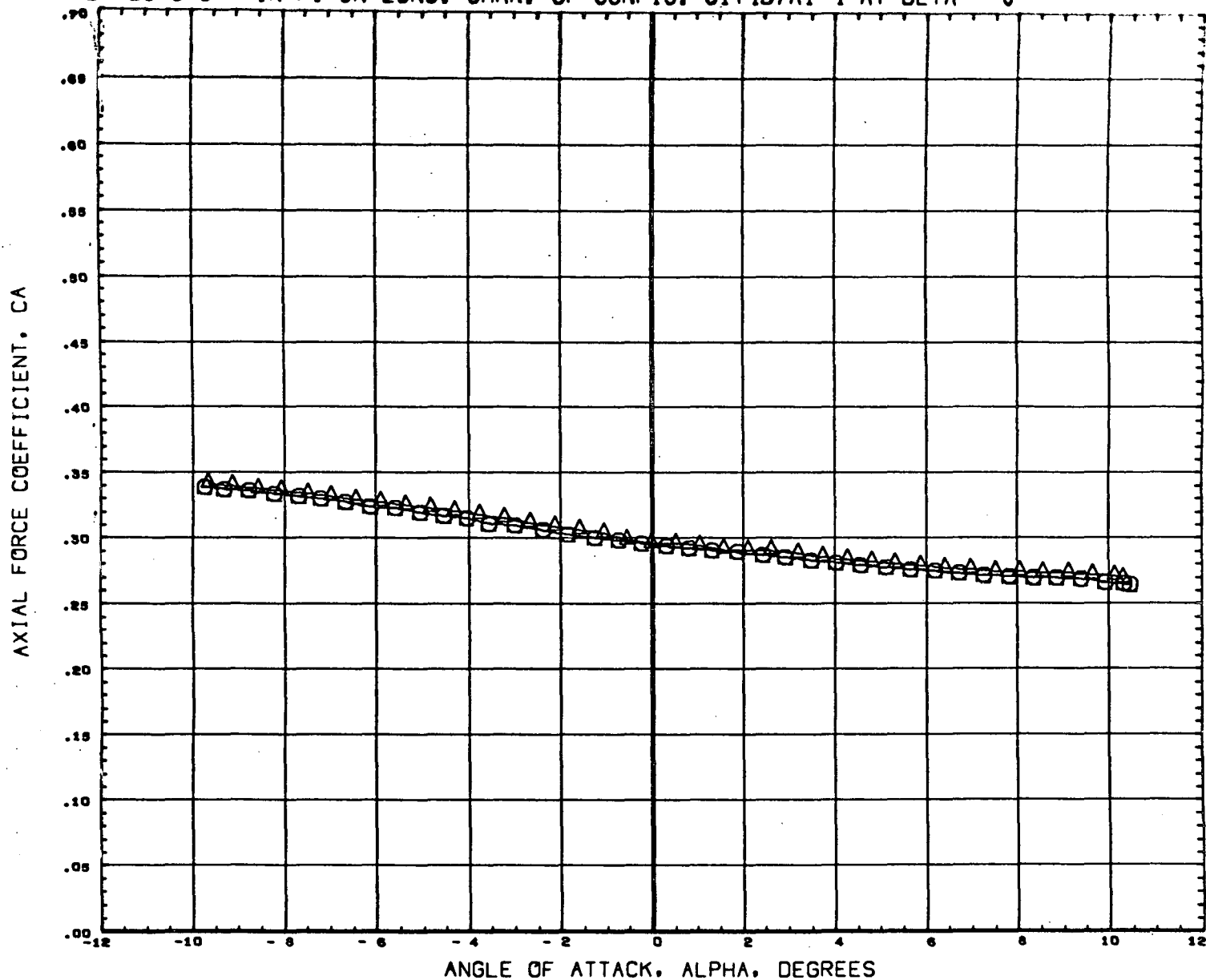


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD7572) | MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD7586) | MDAC S-222 COMPOSITE(T-CG) 01T4F1B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.3004 IN. |
| | | | | | | BREF | 682.0004 IN. |
| | | | | | | XMRP | 957.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 |

MACH 1.51

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EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. 01T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7572) MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4
 (CD7586) MDAC S-222 COMPOSITE(T-CG) 01T4F1B7A1-4

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 |

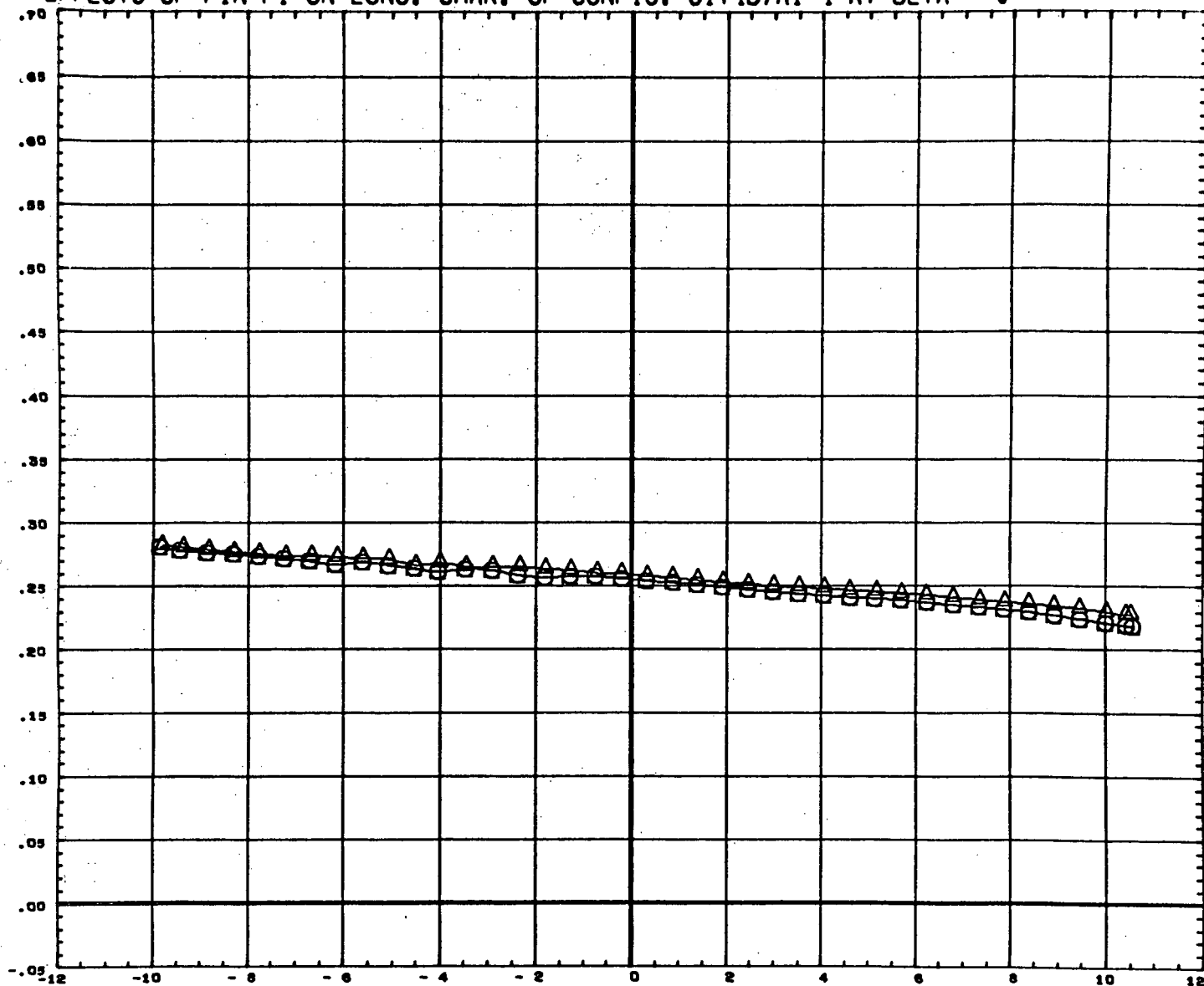
MACH

2.20

PAGE 318

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. 01T4B7A1-4 AT BETA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



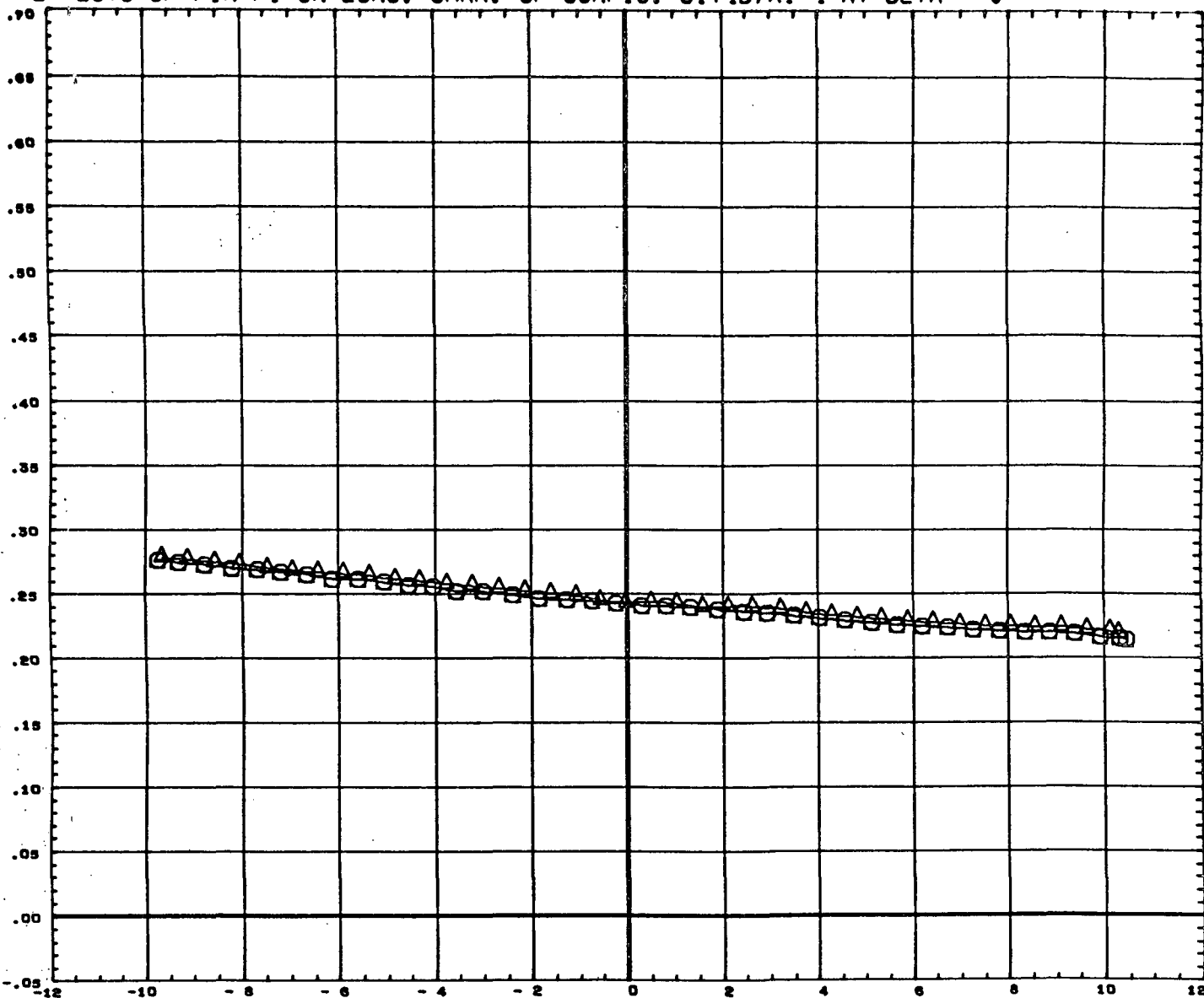
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|--|---|
| (CD7572)  | MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4 |
| (CD7586)  | MDAC S-222 COMPOSITE(T-CG) 01T4F1B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 937.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 |

MACH 1.51

PAGE 319

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. 01T4B7A1-4 AT BETA = 0



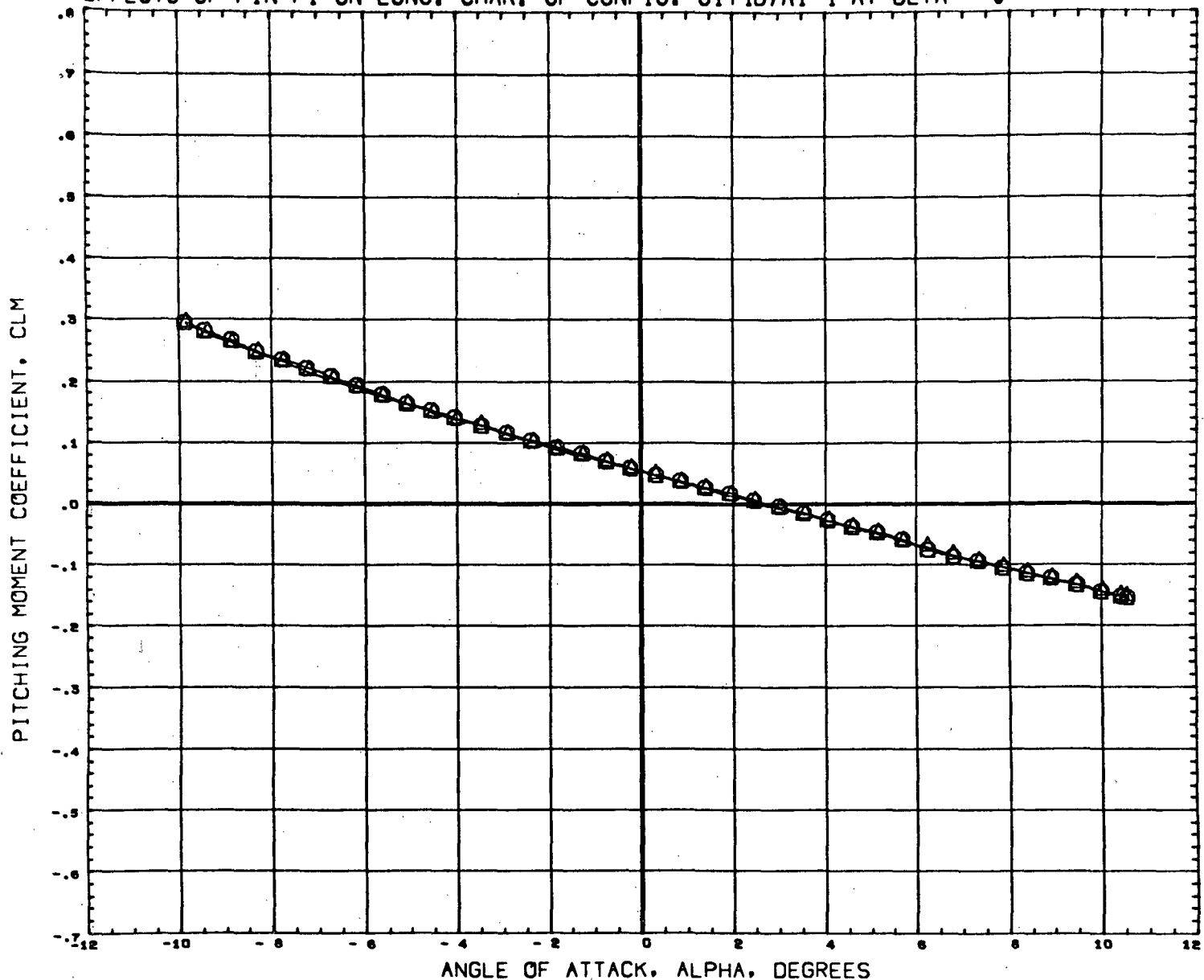
DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (C07572)  MDAC S-222 COMPOSITE (T-CG) 01T4B7A1-4
 (C07586)  MDAC S-222 COMPOSITE (T-CG) 01T4F1B7A1-4

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 |

MACH 2.20

PAGE 320

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. 01T4B7A1-4 AT BETA = 0



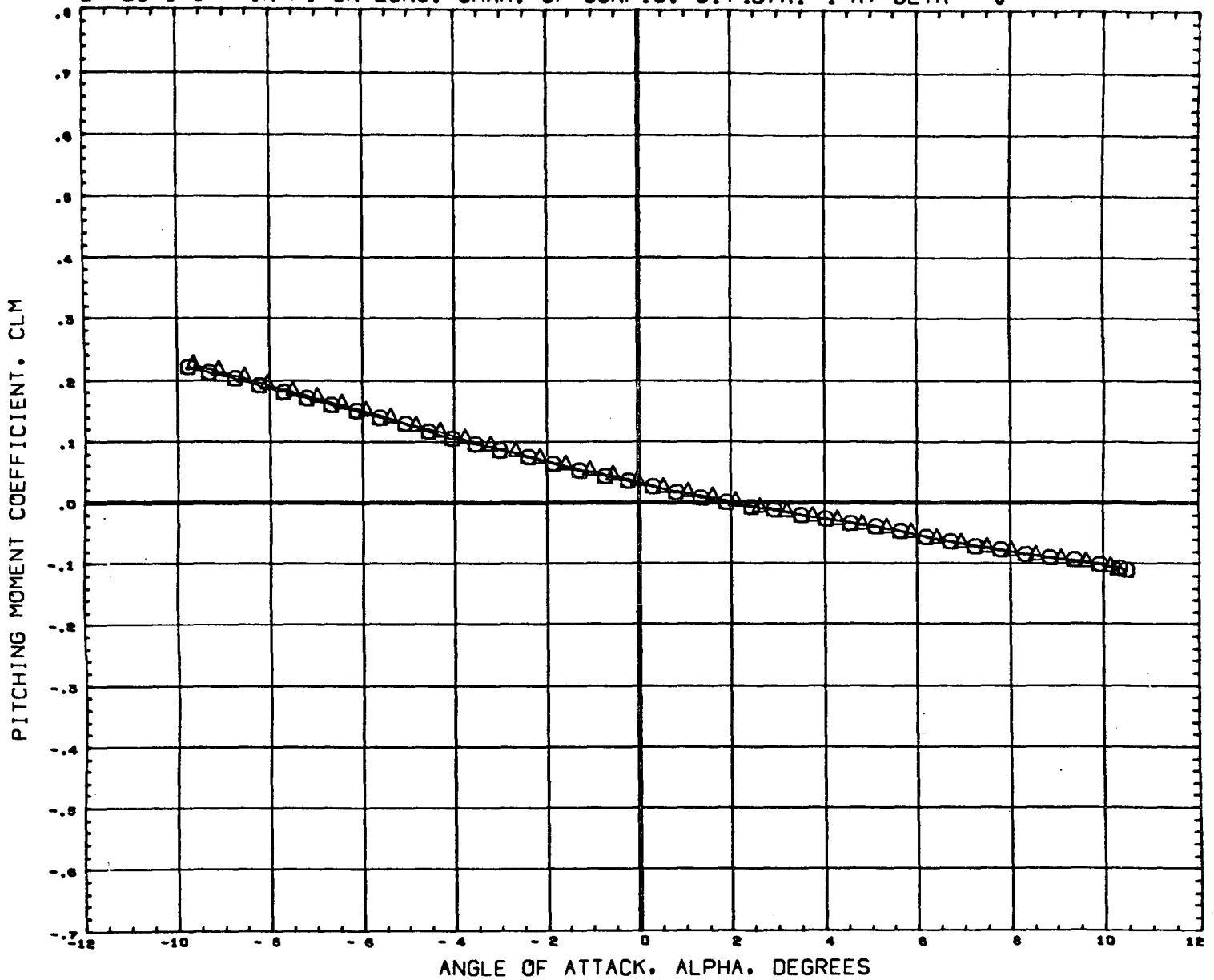
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD7972) | MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD7966) | MDAC S-222 COMPOSITE(T-CG) 01T4F1B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 |

MACH



1.51

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EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. 01T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD7572)  MDAC S-222 COMPOSITE (T-CG) 01T4B7A1-4
 (CD7586)  MDAC S-222 COMPOSITE (T-CG) 01T4F1B7A1-4

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

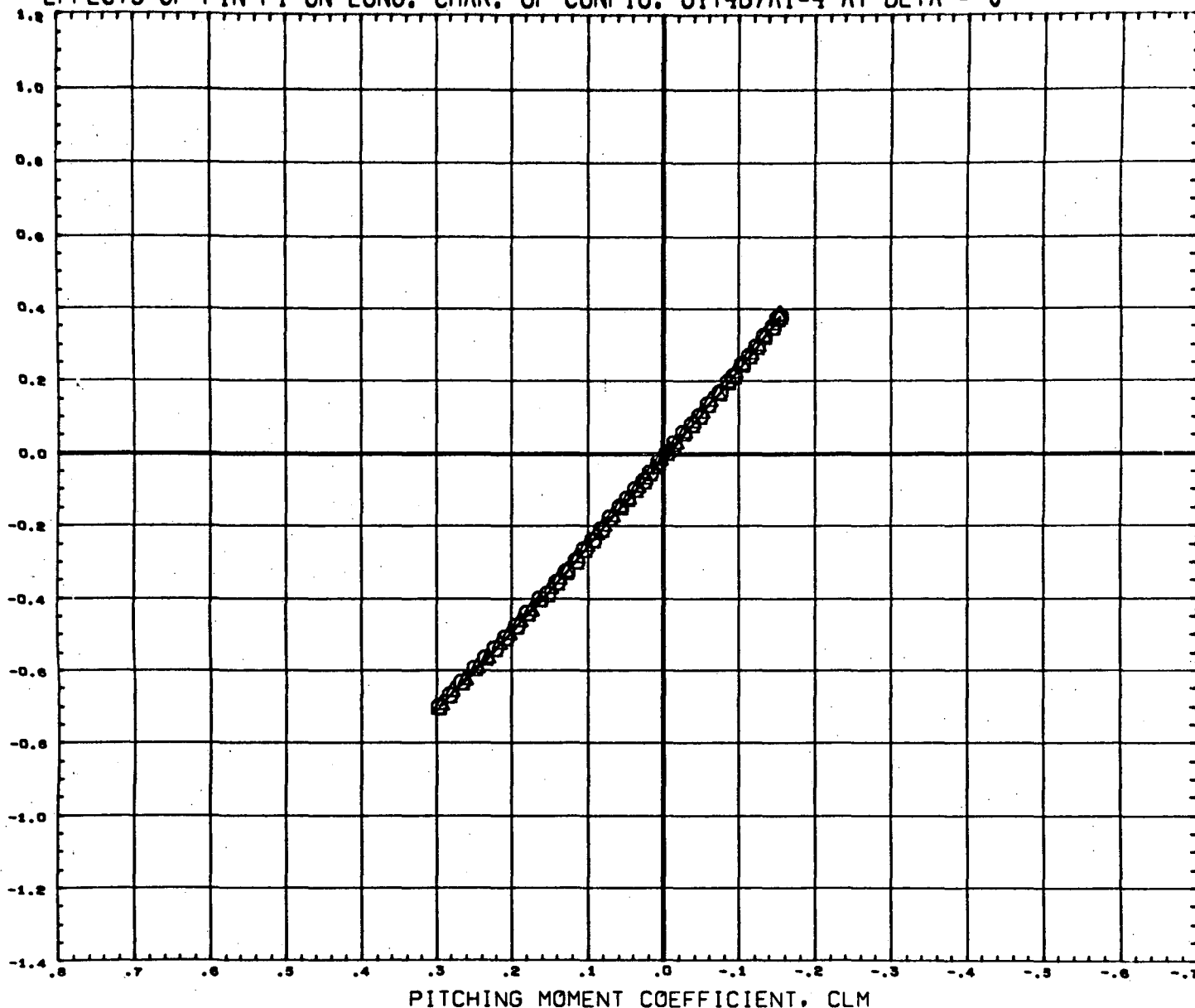
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 357.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH 2.20

PAGE 322

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. 01T4B7A1-4 AT BETA = 0

NORMAL FORCE COEFFICIENT, CN



DATA SET SYMBOL CONFIGURATION DESCRIPTION

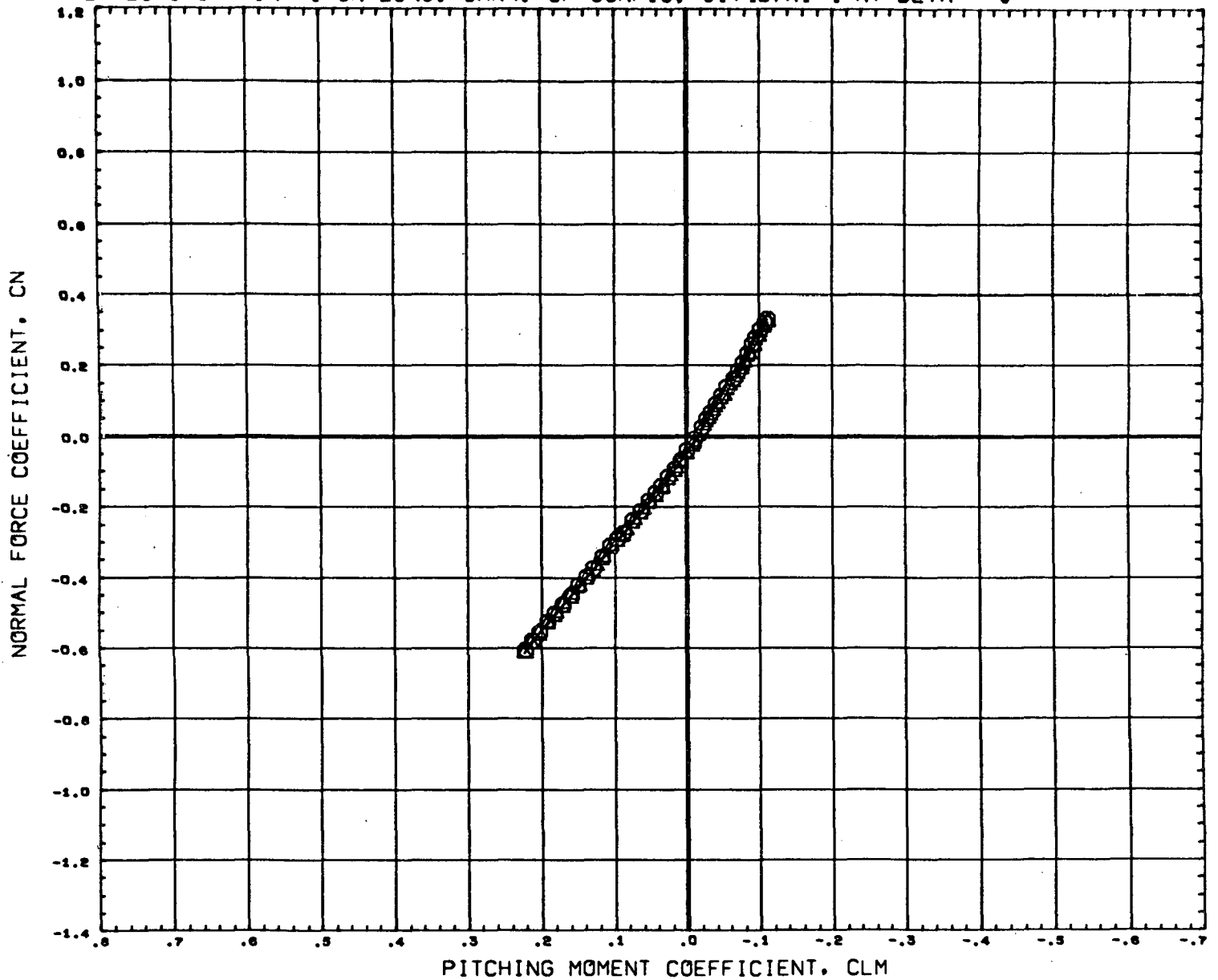
(CD7572) MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4
(CD7586) MDAC S-222 COMPOSITE(T-CG) 01T4F1B7A1-4

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-------|--------|--------|--------|-----------------------|-----------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | BREF | 882.0004 | IN. |
| | | | | XMRP | 557.0004 | IN. |
| | | | | YMRP | 0.0000 | IN. |
| | | | | ZMRP | 200.0004 | IN. |
| | | | | SCALE | 0.0060 | |

MACH 1.51

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EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. 01T4B7A1-4 AT BETA = 0

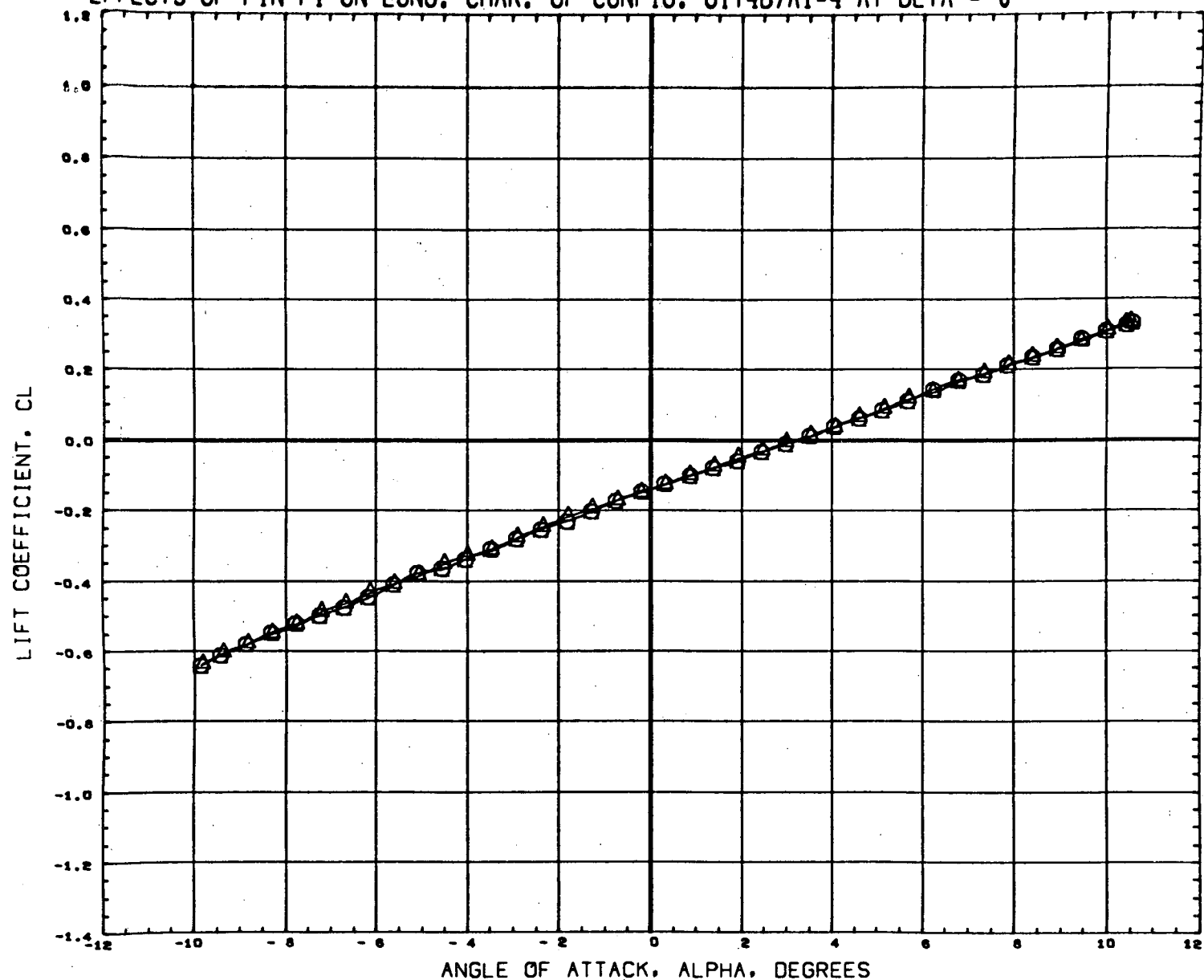


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD7372) | MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD7386) | MDAC S-222 COMPOSITE(T-CG) 01T4F1B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XHRP | 557.0004 IN. |
| | | | | | | YHRP | 0.0000 IN. |
| | | | | | | ZHRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 |

MACH 2.20

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EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. 01T4B7A1-4 AT BETA = 0

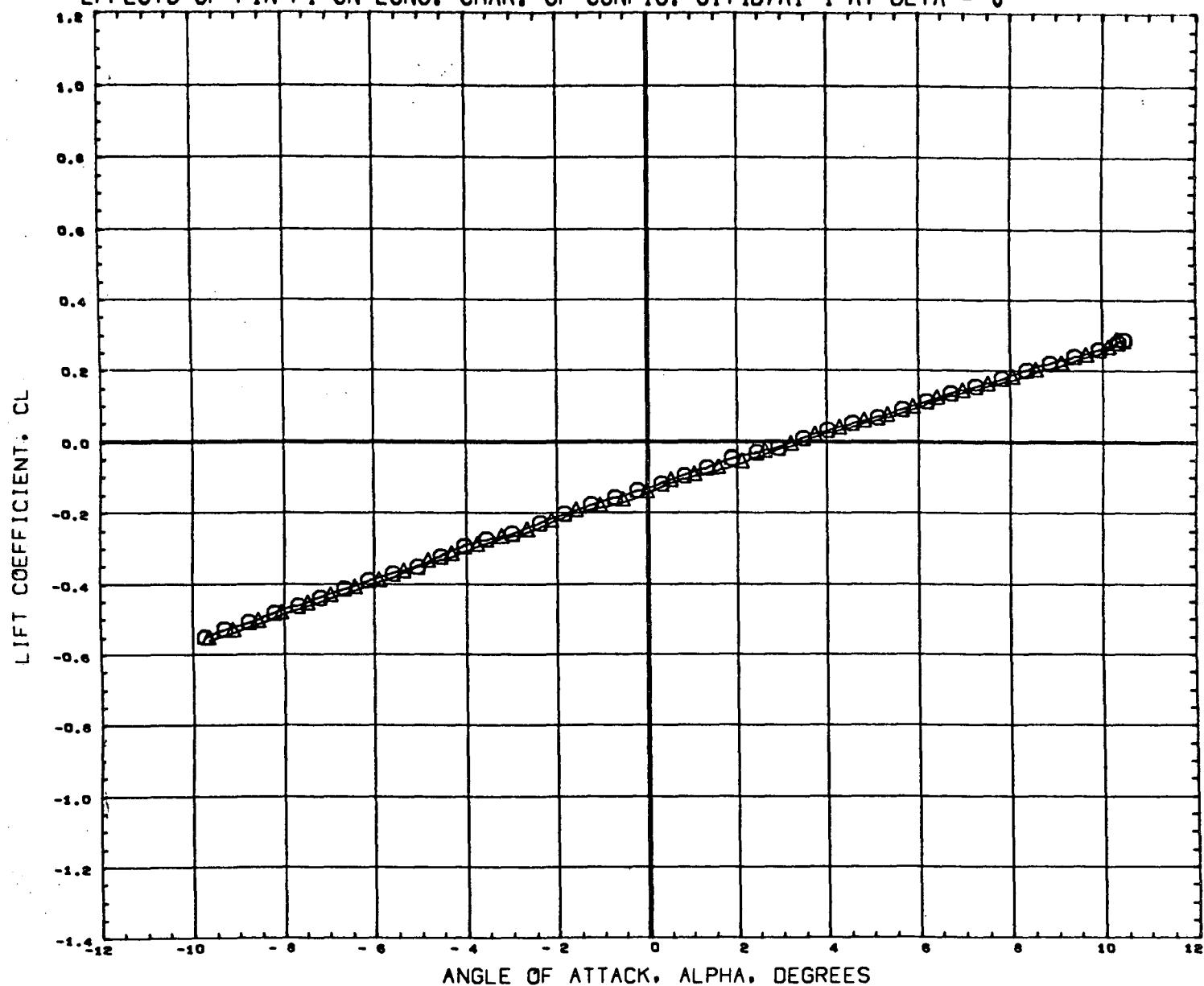


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD7572) | MDAC S-222 COMPOSITE (T-CG) 01T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD7586) | MDAC S-222 COMPOSITE (T-CG) 01T4F1B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 |

MACH 1.51

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EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. 01T4B7A1-4 AT BETA = 0



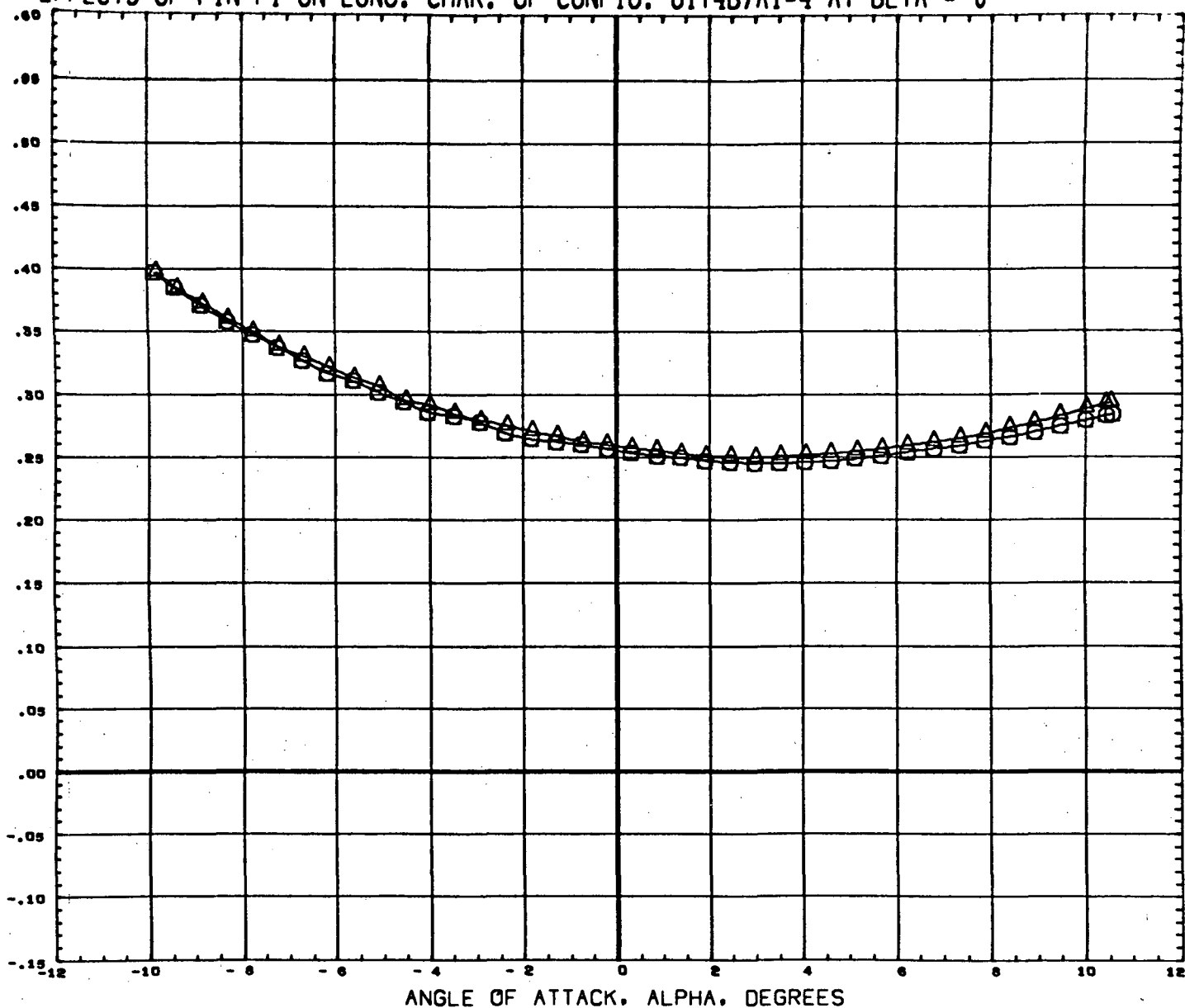
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD7372) | MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD7366) | MDAC S-222 COMPOSITE(T-CG) 01T4F1B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 |

MACH 2.20

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EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. 01T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD7572) MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4
 (CD7596) MDAC S-222 COMPOSITE(T-CG) 01T4F1B7A1-4

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

REFERENCE INFORMATION

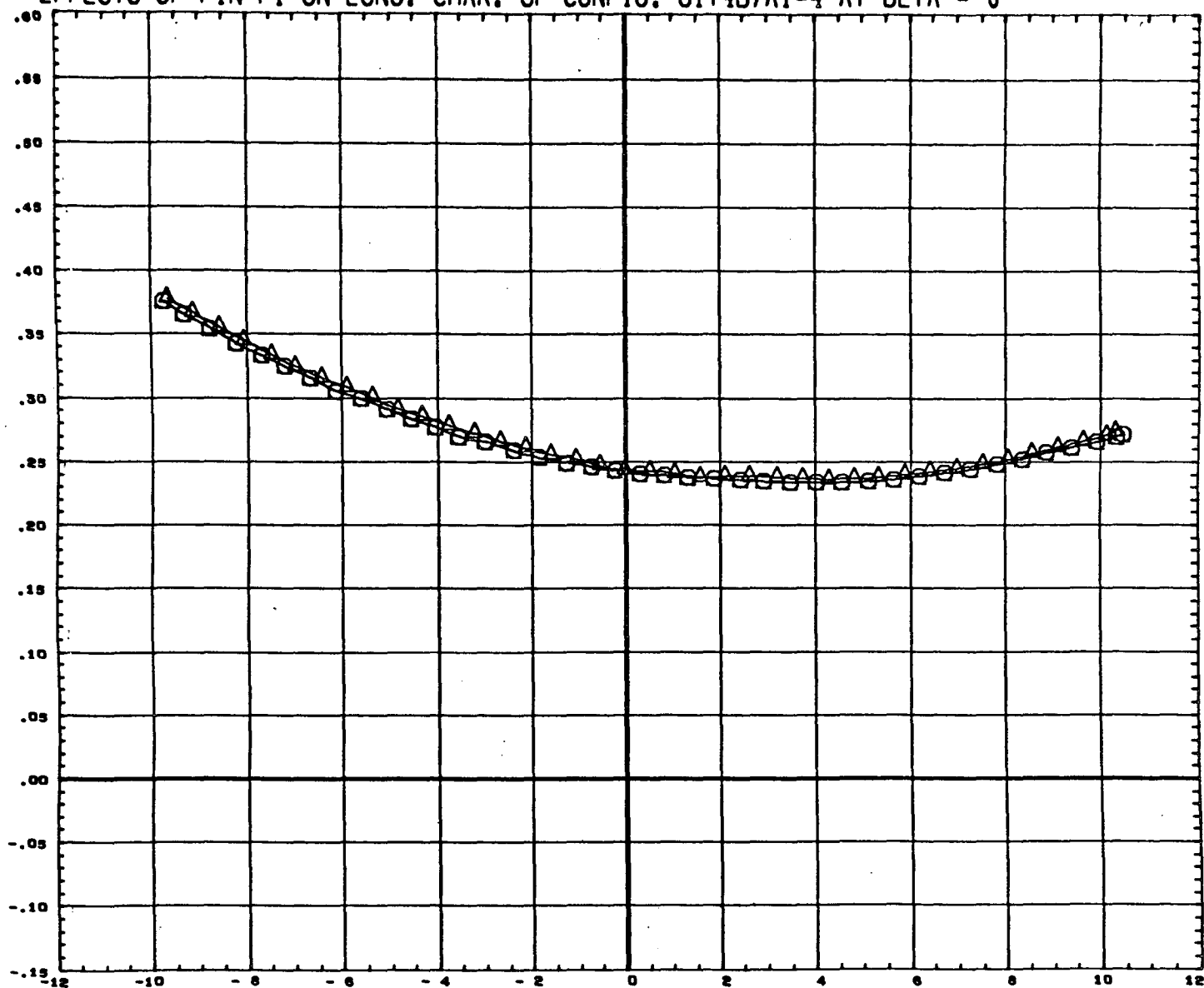
| | | |
|-------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 862.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH 1.51

PAGE 327

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. 01T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



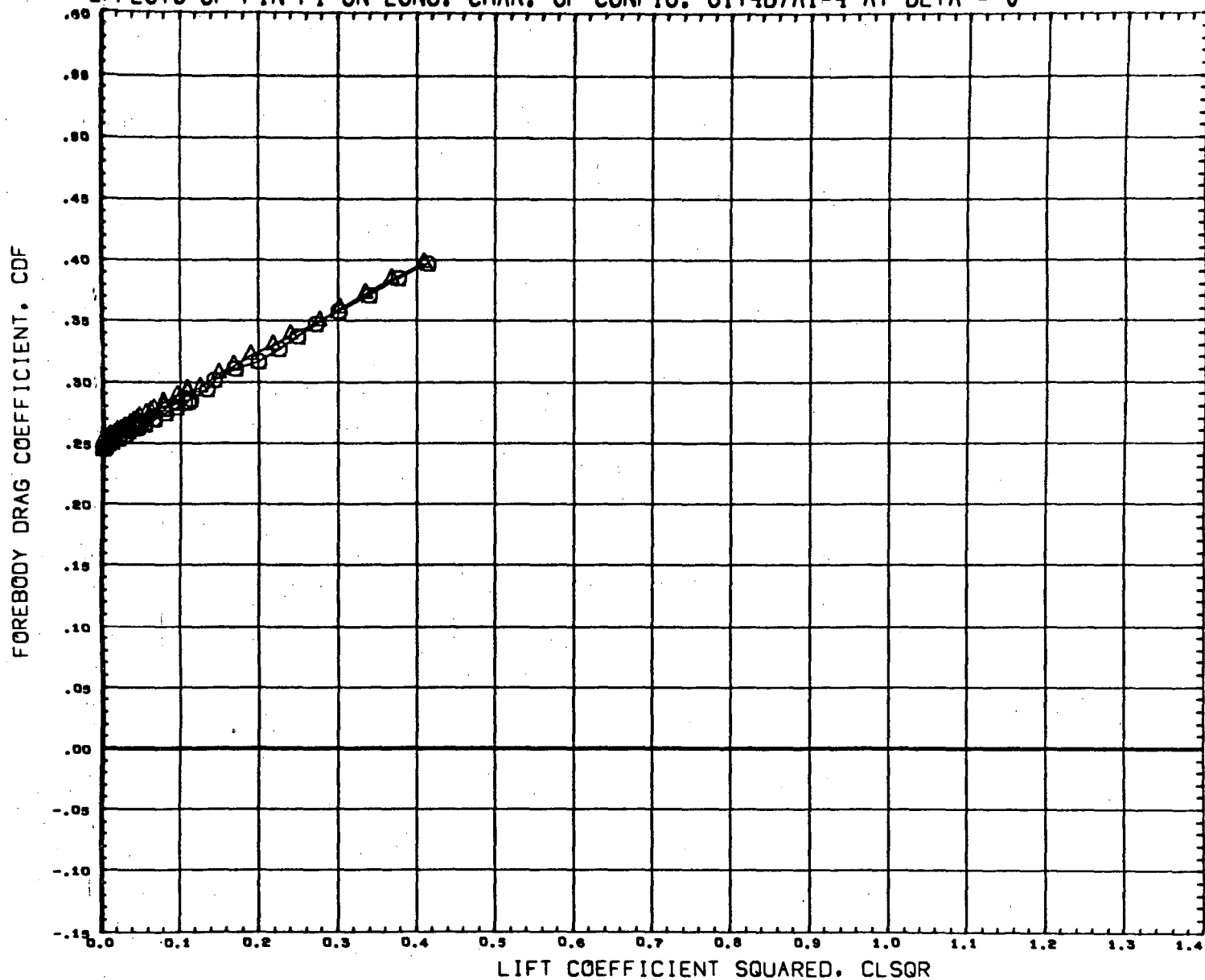
ANGLE OF ATTACK, ALPHA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD7572) | MDAC S-222 COMPOSITE (T-CG) 01T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD7586) | MDAC S-222 COMPOSITE (T-CG) 01T4F1B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 |

MACH 2.20

PAGE 328

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. 01T4B7A1-4 AT BETA = 0



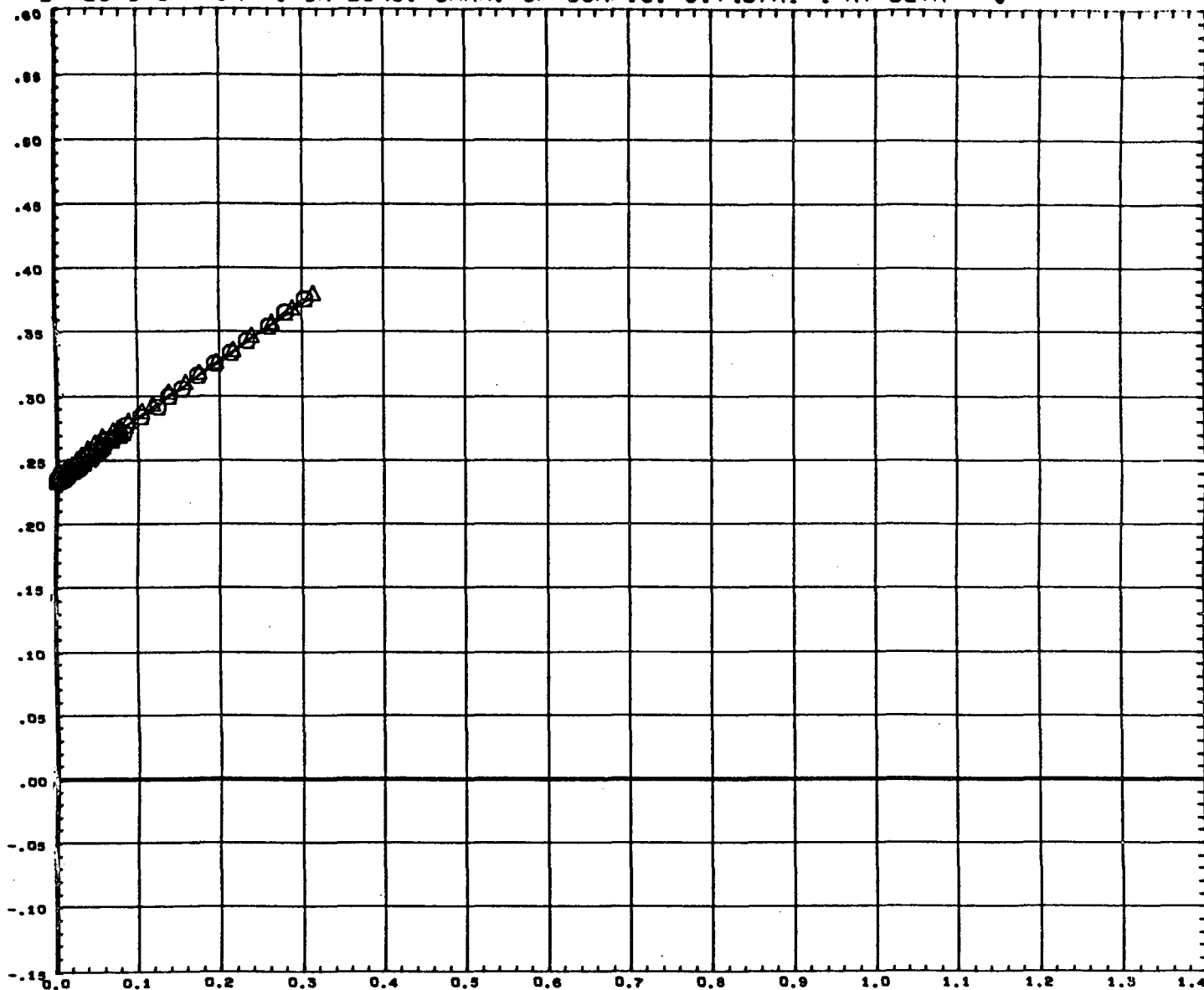
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | ATLRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD7572) | NDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD7586) | NDAC S-222 COMPOSITE(T-CG) 01T4F1B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 |

MACH 1.51

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EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. 01T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



LIFT COEFFICIENT SQUARED, CLSQ

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD7372) | MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4 |
| (CD7586) | MDAC S-222 COMPOSITE(T-CG) 01T4F1B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

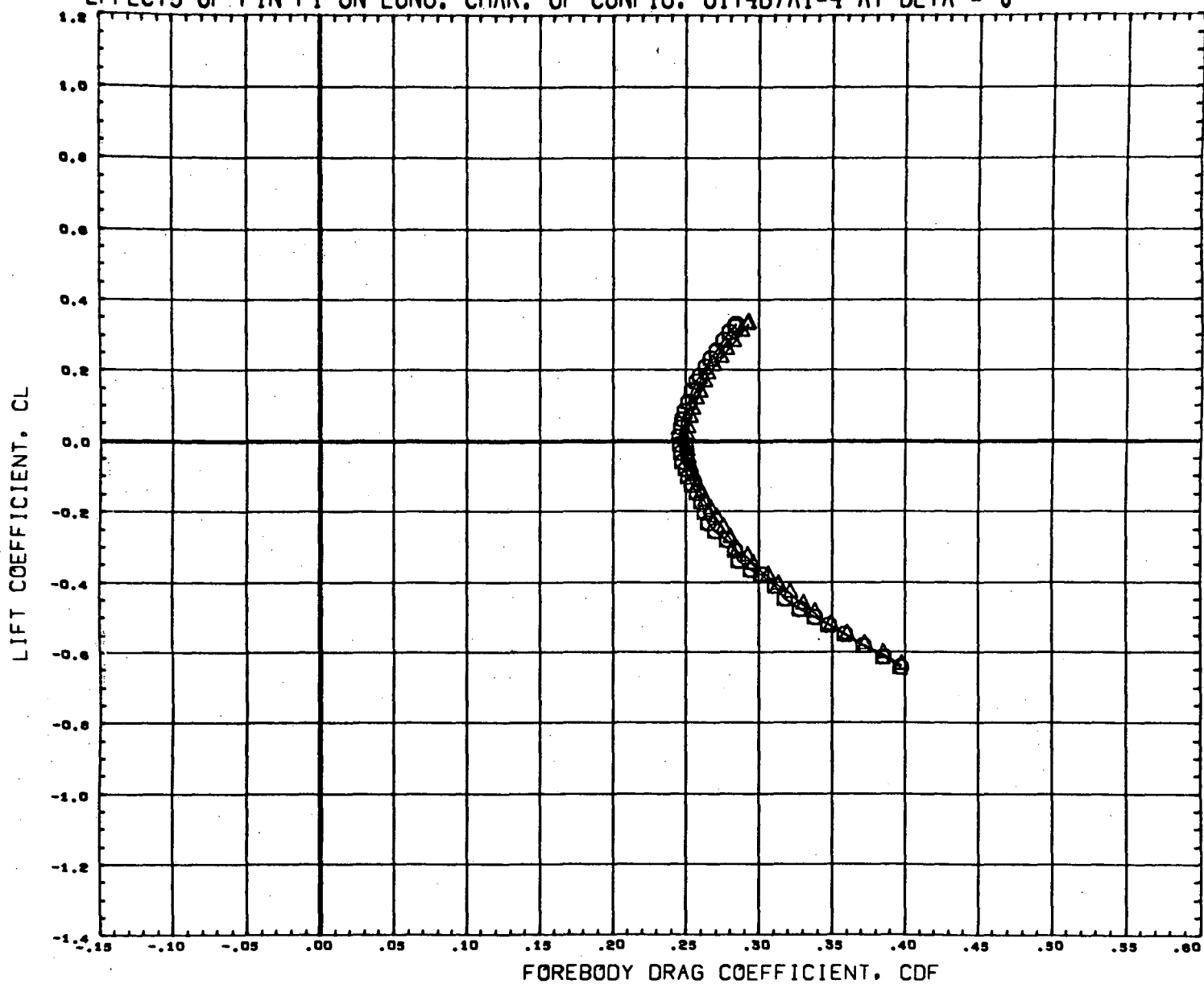
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH

2.20

PAGE 330

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. 01T4B7A1-4 AT BETA = 0



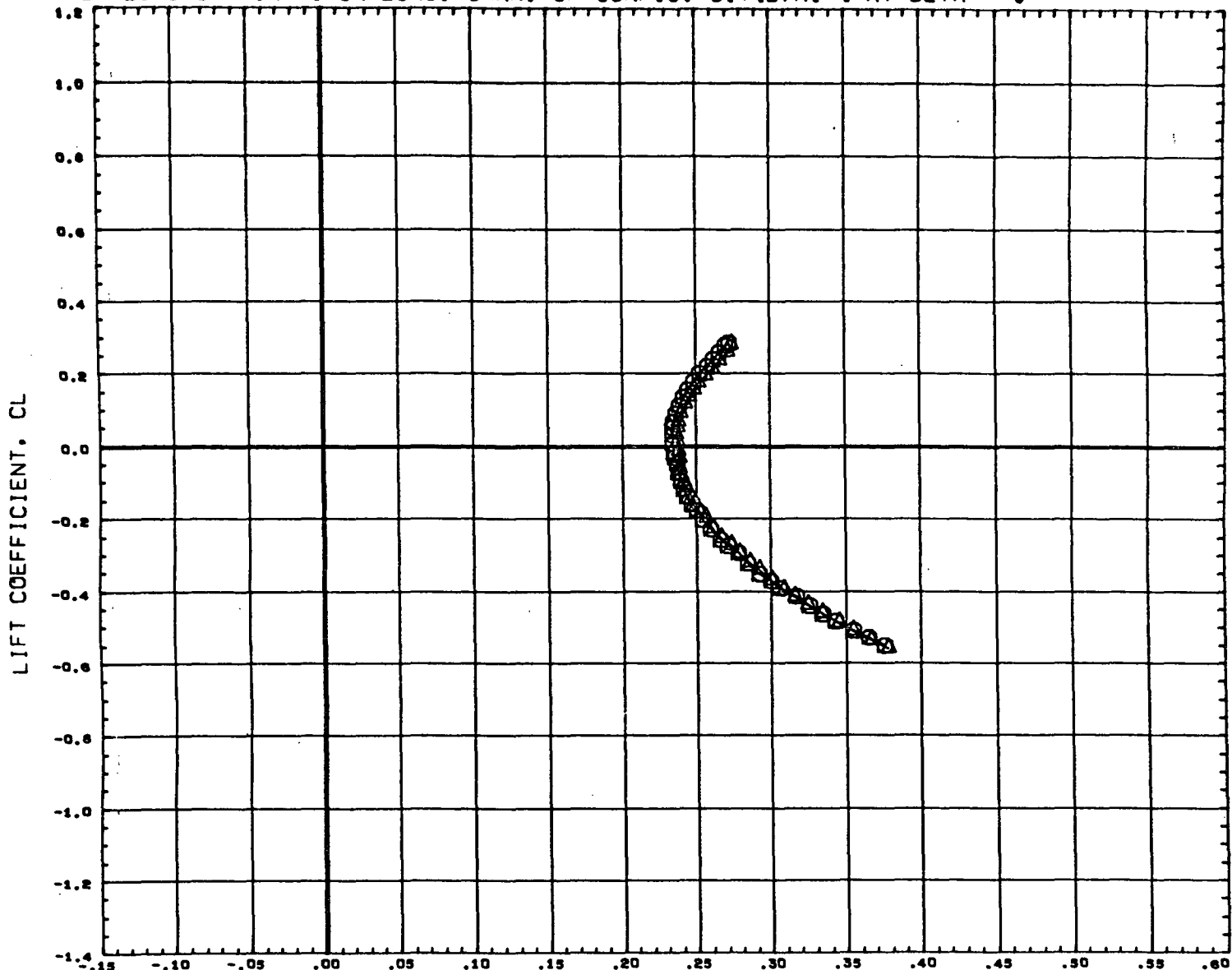
DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7572) MDAC S-222 COMPOSITE (T-CG) 01T4B7A1-4
 (CD7566) MDAC S-222 COMPOSITE (T-CG) 01T4F1B7A1-4

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 |

MACH 1.51

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EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. 01T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD7572) | MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4 |
| (CD7566) | MDAC S-222 COMPOSITE(T-CG) 01T4F1B7A1-4 |

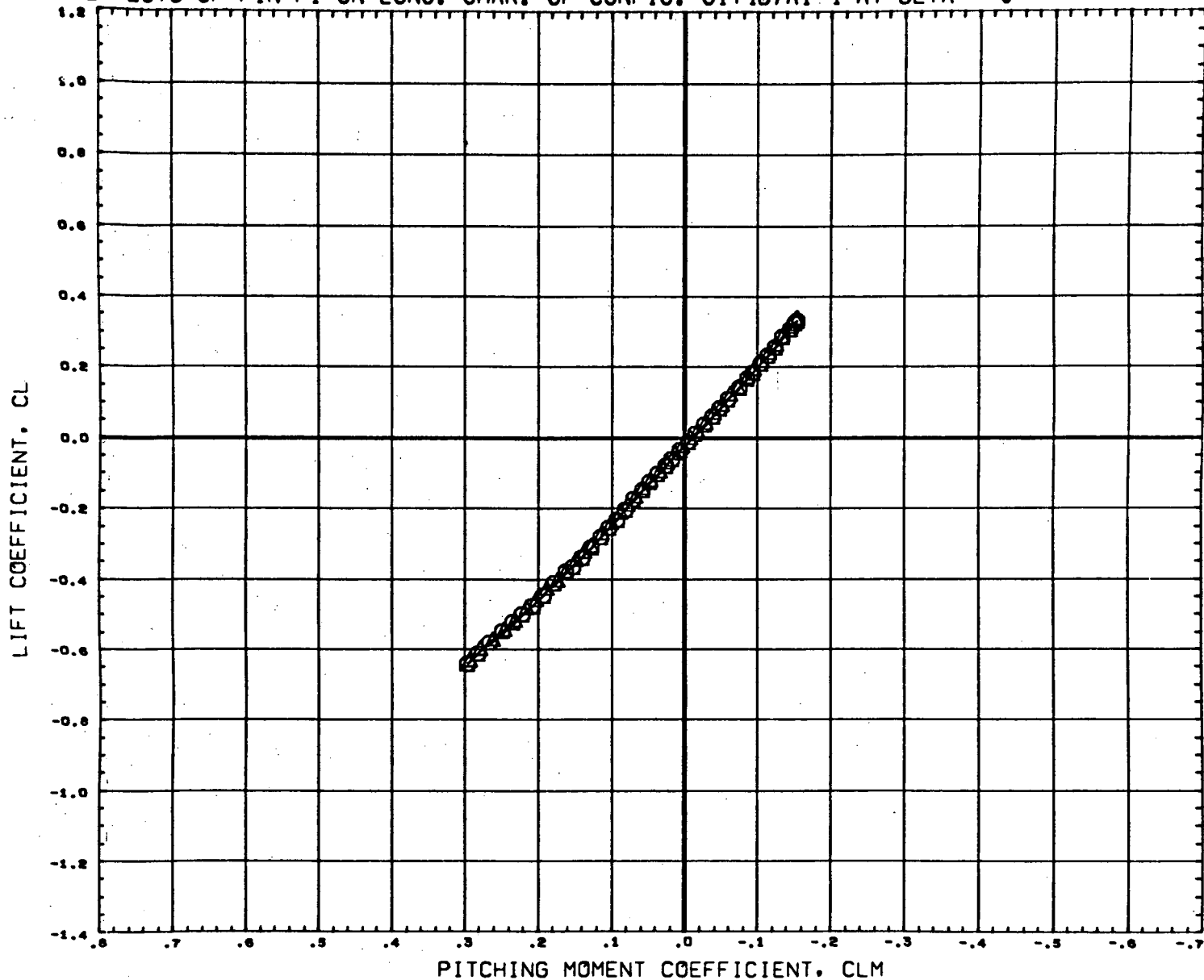
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH 2.20

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EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. 01T4B7A1-4 AT BETA = 0



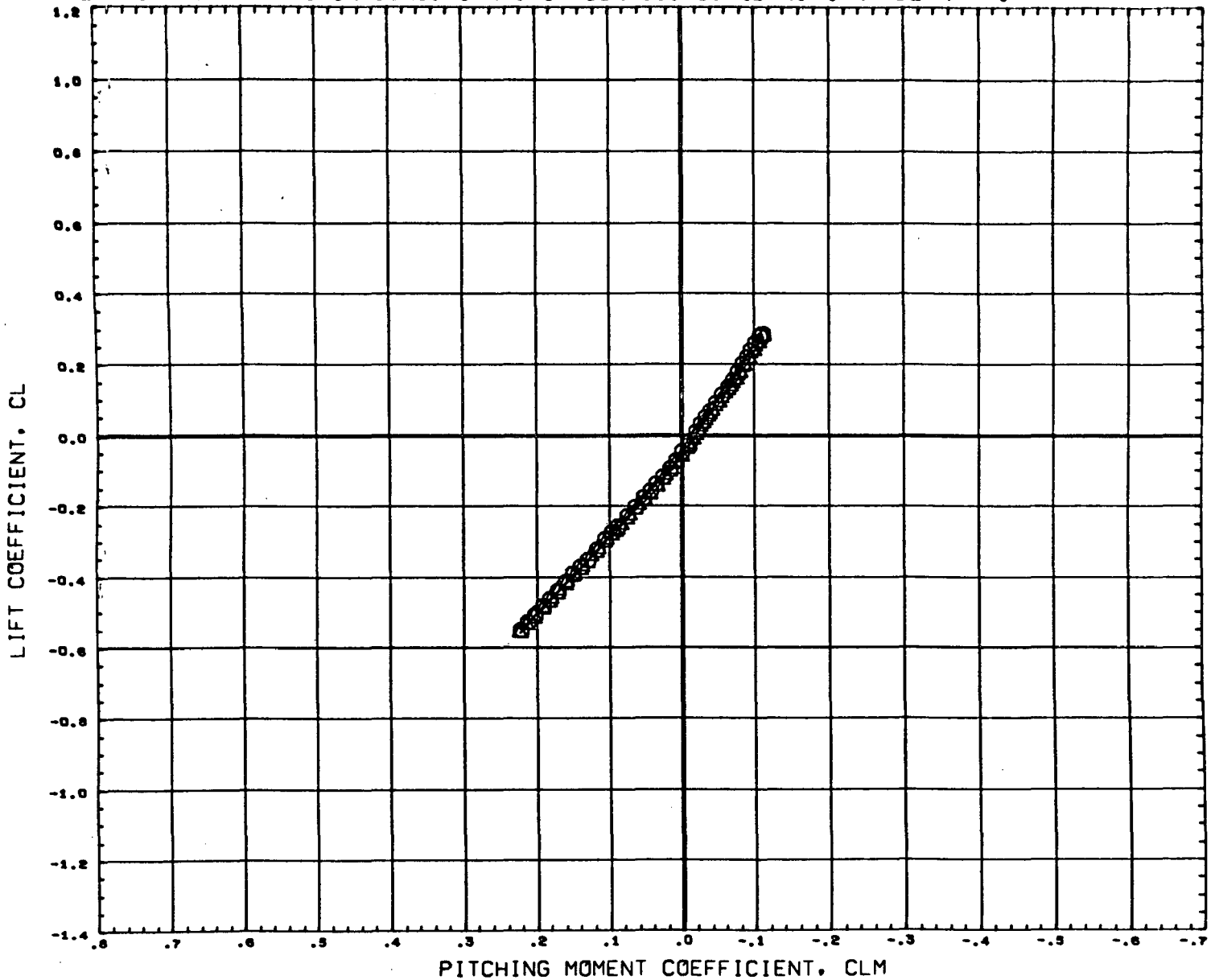
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD7572) | MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4 |
| (CD7586) | MDAC S-222 COMPOSITE(T-CG) 01T4F1B7A1-4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 |

MACH 1.51

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EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. 01T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD7372) | MDAC S-222 COMPOSITE (T-CG) 01T4B7A1-4 |
| (CD7566) | MDAC S-222 COMPOSITE (T-CG) 01T4F1B7A1-4 |

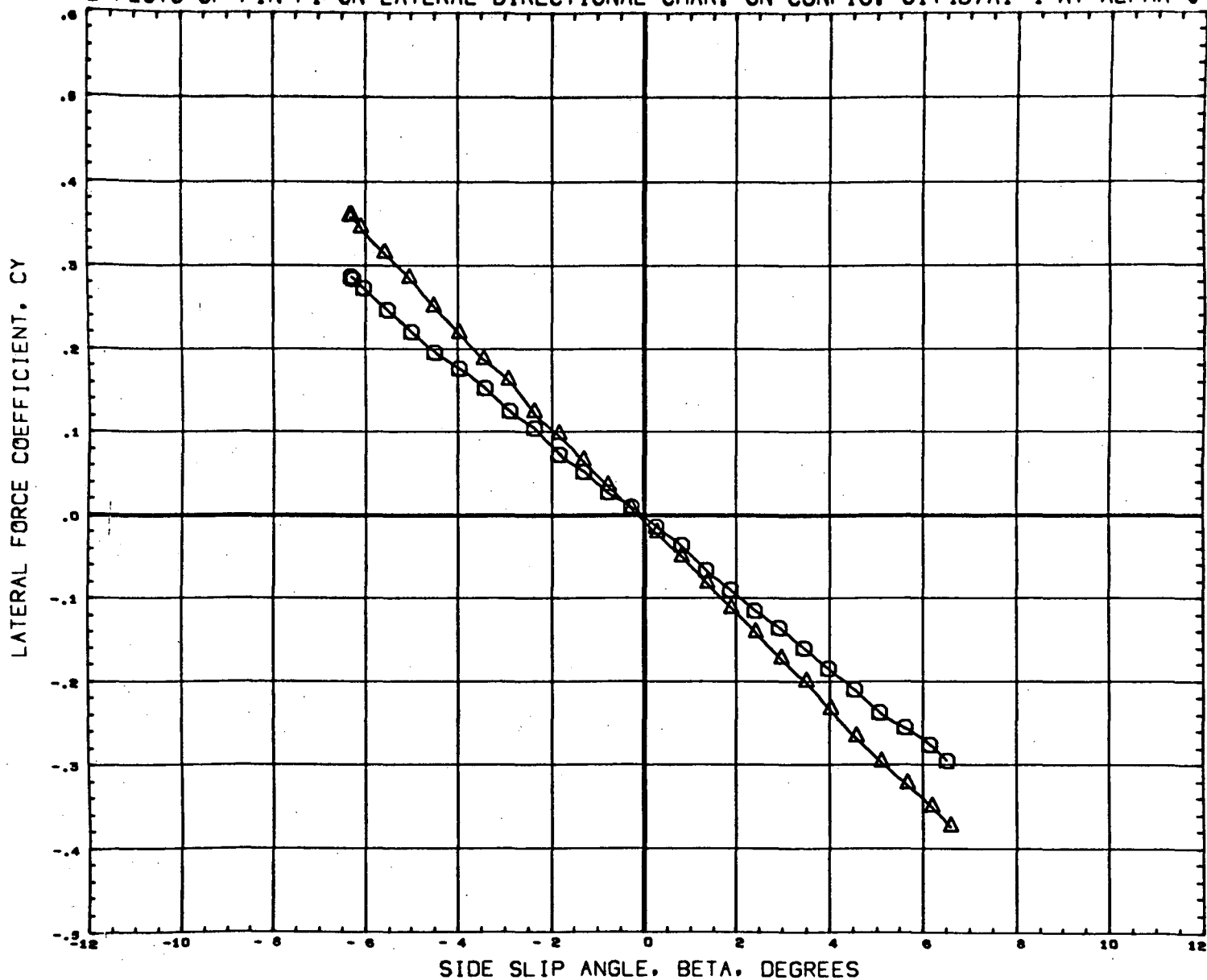
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH 2.20

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EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. 01T4B7A1-4 AT ALPHA=0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
(RD7573) ○ MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4
(RD7587) △ MDAC S-222 COMPOSITE(T-CG) 01T4F1B7A1-4

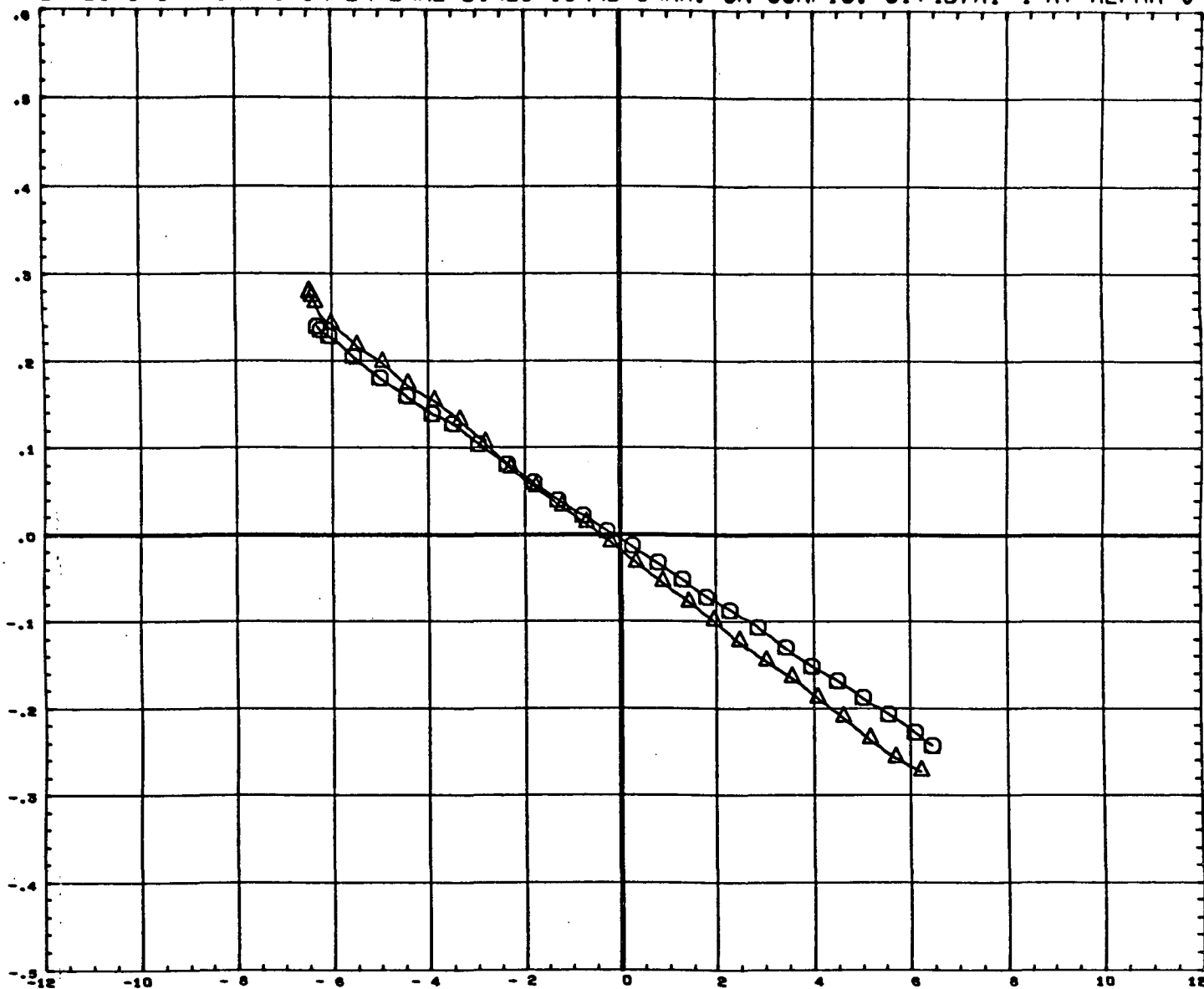
| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 682.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 |

MACH 1.51

PAGE 335

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. 01T4B7A1-4 AT ALPHA=0

LATERAL FORCE COEFFICIENT, CY



SIDE SLIP ANGLE, BETA, DEGREES

DATA SET SYMBOL CONFIGURATION DESCRIPTION

(RD7573) MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4
 (RD7587) MDAC S-222 COMPOSITE(T-CG) 01T4F1B7A1-4

ALPHA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 0.000

REFERENCE INFORMATION

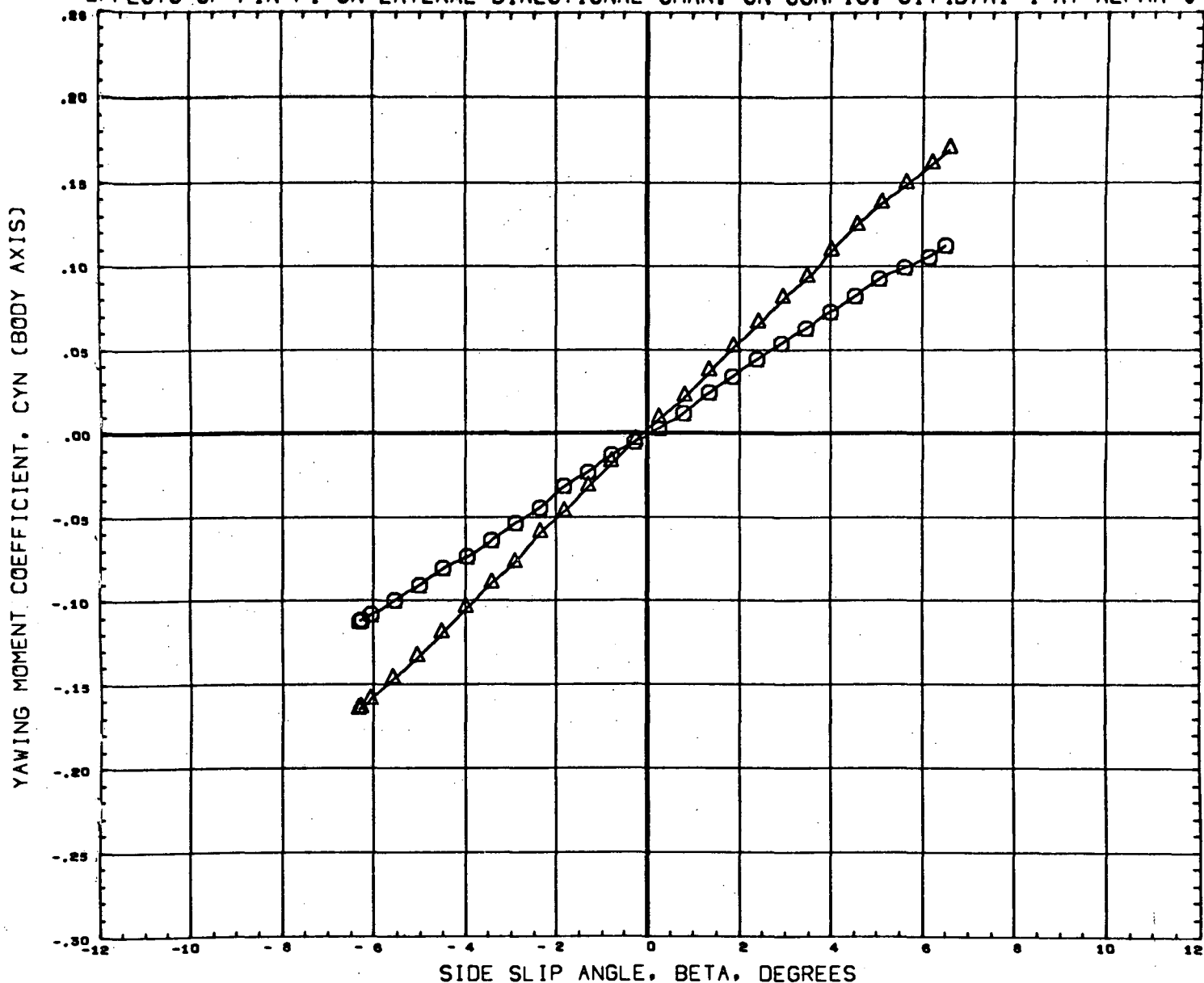
SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 862.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH

2.20

PAGE 336

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. 01T4B7A1-4 AT ALPHA=0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(RD7573) MDAC S-222 COMPOSITE (T-CG) 01T4B7A1-4
(RD7587) MDAC S-222 COMPOSITE (T-CG) 01T4F1B7A1-4

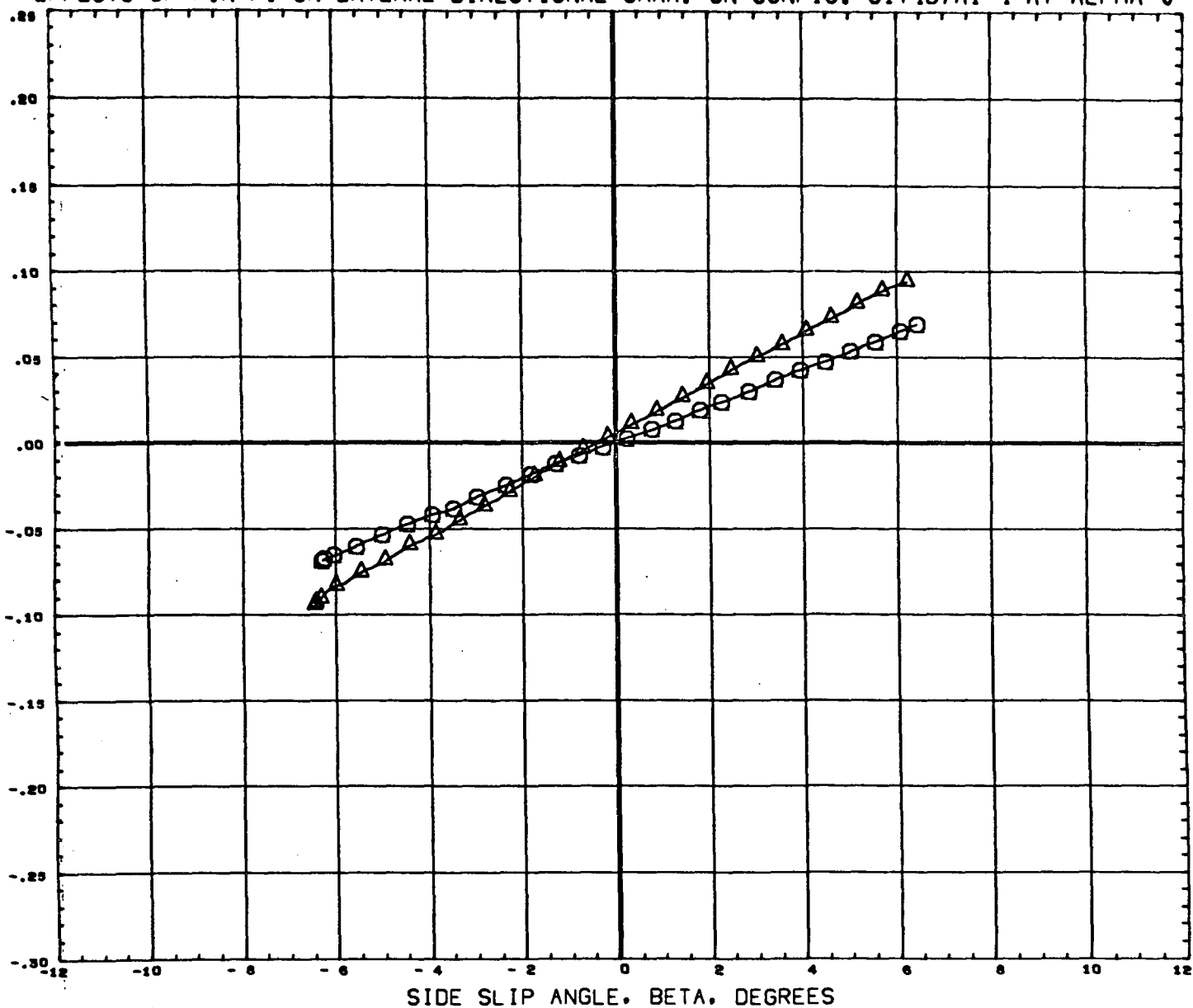
| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-------|--------|--------|--------|-----------------------|-----------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | BREF | 882.0004 | IN. |
| | | | | XMRP | 957.0004 | IN. |
| | | | | YMRP | 0.0000 | IN. |
| | | | | ZMRP | 200.0004 | IN. |
| | | | | SCALE | 0.0060 | |

MACH 1.51

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EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. 01T4B7A1-4 AT ALPHA=0

YAWING MOMENT COEFFICIENT, CYN (BODY AXIS)



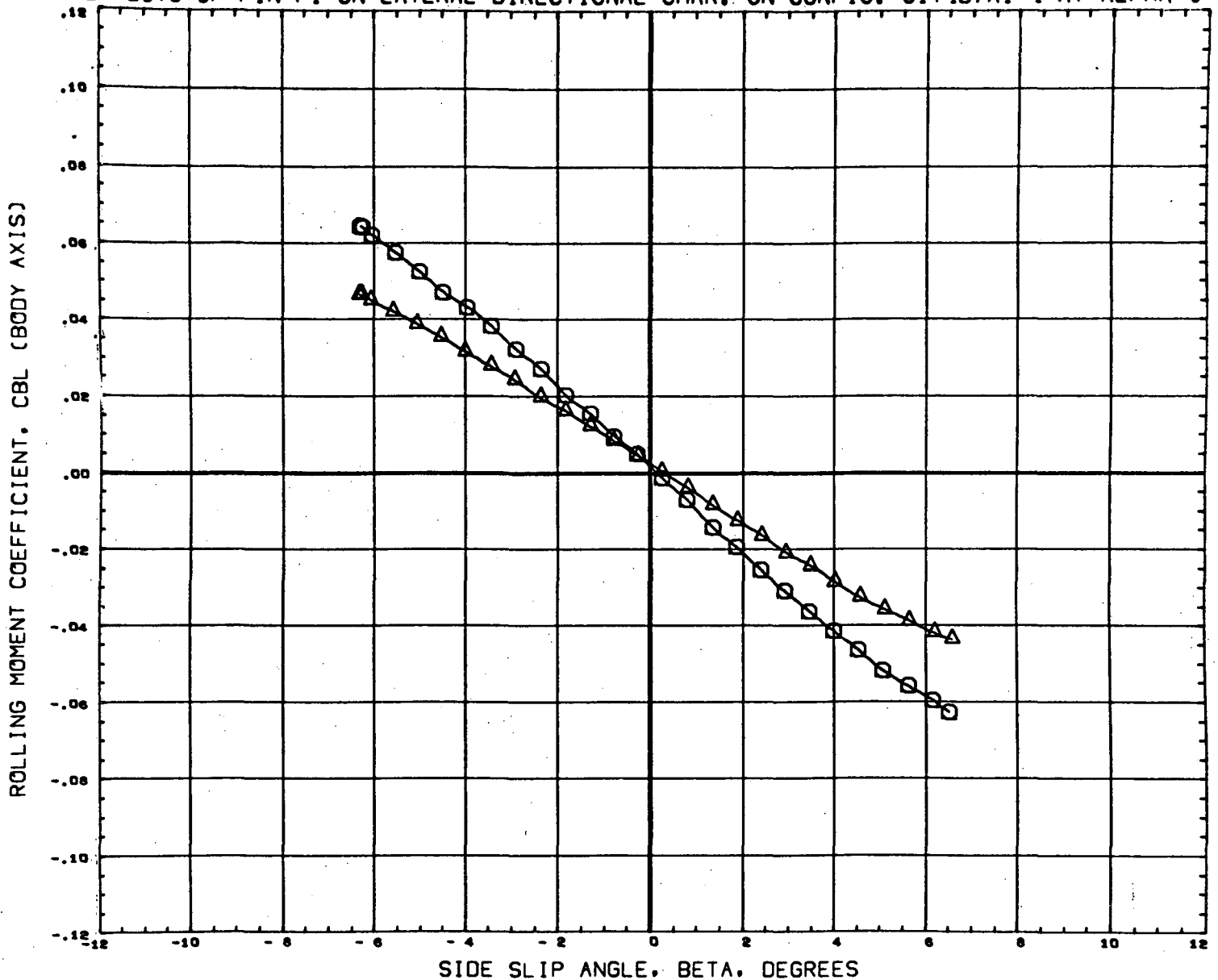
DATA SET SYMBOL CONFIGURATION DESCRIPTION
(RD7573) ○ MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4
(RD7567) Δ MDAC S-222 COMPOSITE(T-CG) 01T4F1B7A1-4

| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 |

MACH 2.20

PAGE 338

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. 01T4B7A1-4 AT ALPHA=0

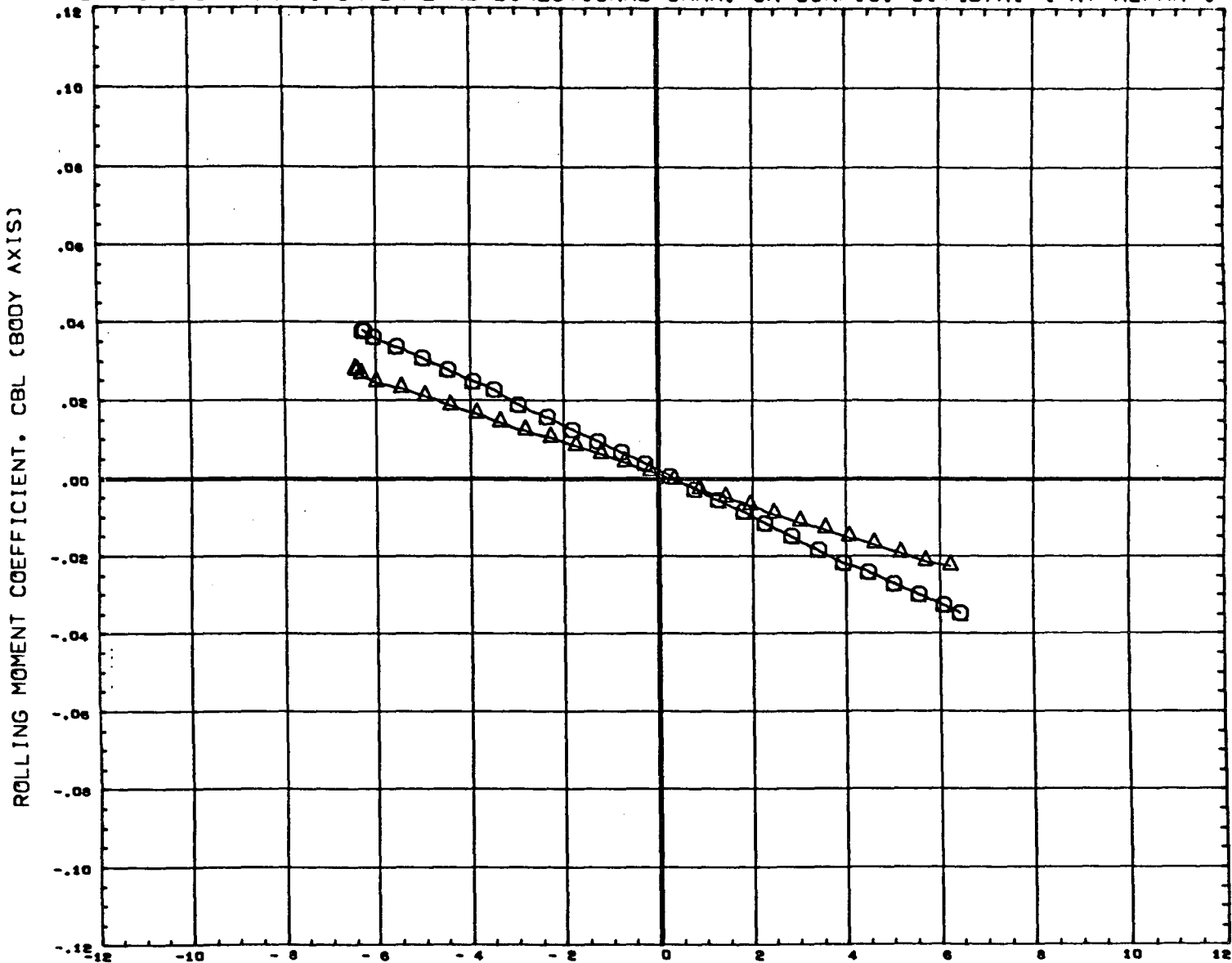


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD7573) | MDAC S-222 COMPOSITE (T-CG) 01T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD7587) | MDAC S-222 COMPOSITE (T-CG) 01T4F1B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 862.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 |

MACH 1.51

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EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. 01T4B7A1-4 AT ALPHA=0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (RD7573) ○ | MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4 |
| (RD7567) △ | MDAC S-222 COMPOSITE(T-CG) 01T4F1B7A1-4 |

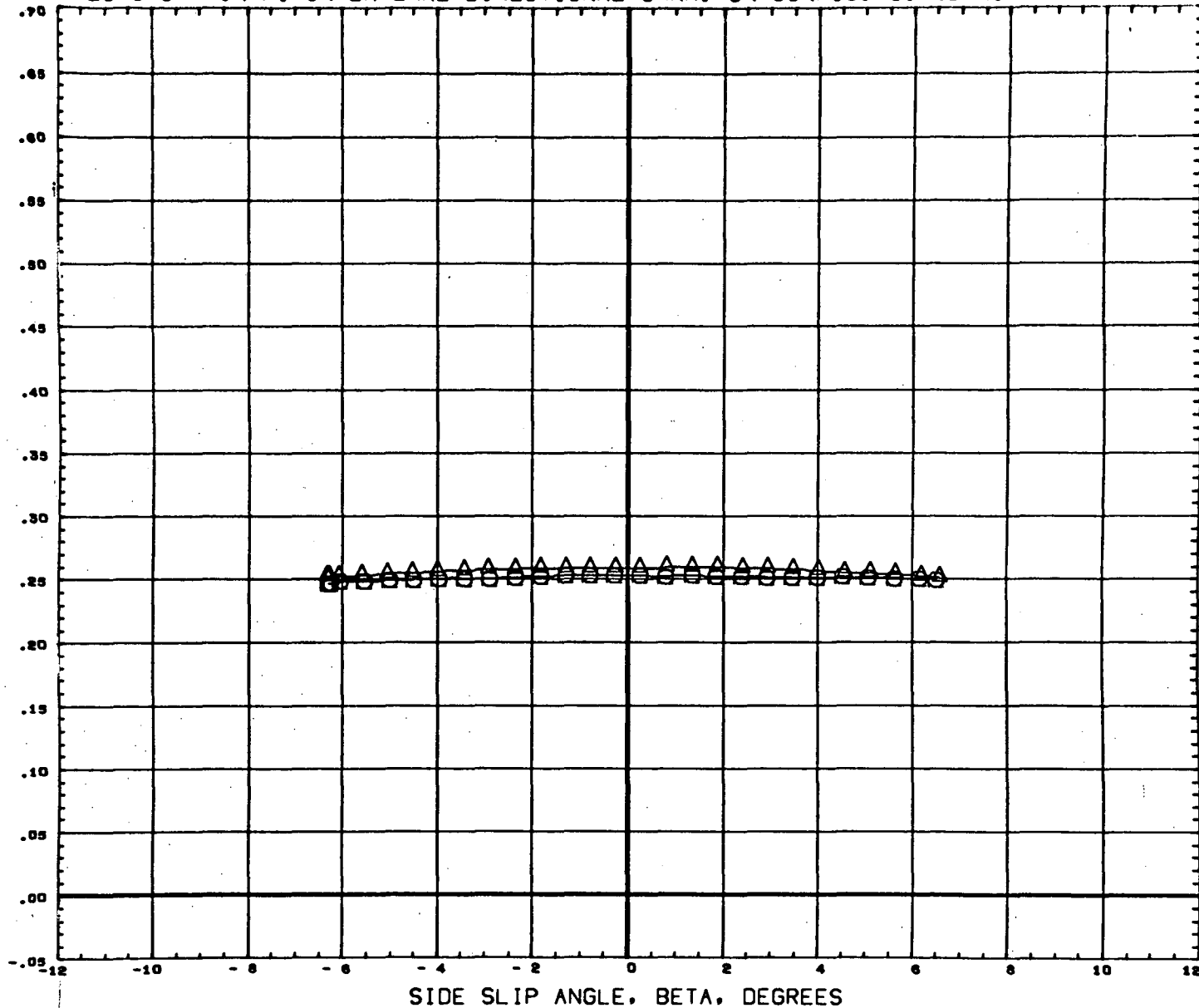
| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-------|--------|--------|--------|-----------------------|-----------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.3004 | IN. |
| | | | | BREF | 882.0004 | IN. |
| | | | | XMRP | 557.0004 | IN. |
| | | | | YMRP | 0.0000 | IN. |
| | | | | ZMRP | 200.0004 | IN. |
| | | | | SCALE | 0.0060 | |

MACH 2.20

PAGE 340

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. 01T4B7A1-4 AT ALPHA=0

FOREBODY AXIAL FORCE COEFFICIENT, CAF

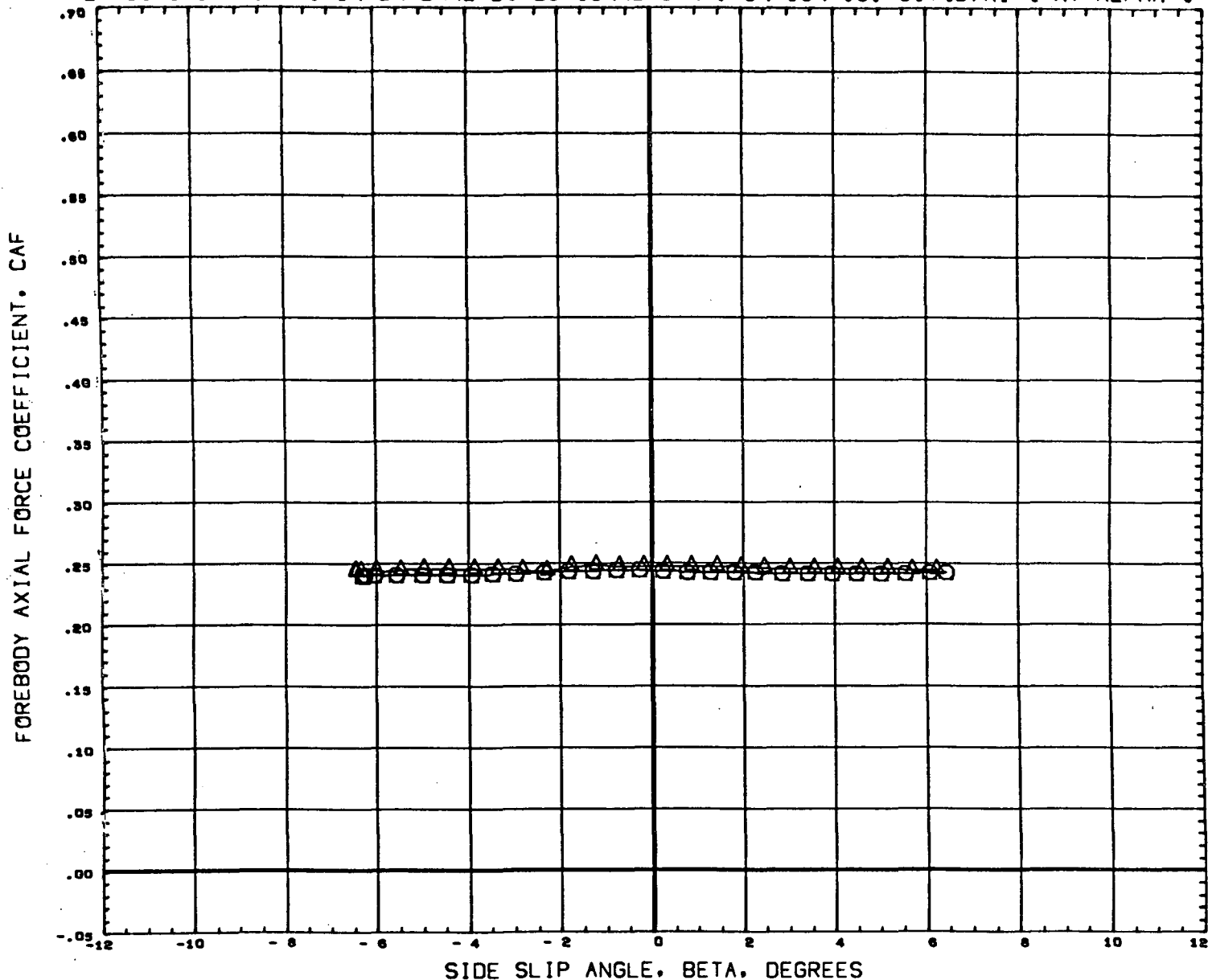


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD7573) | MDAC S-222 COMPOSITE (T-CG) 01T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD7587) | MDAC S-222 COMPOSITE (T-CG) 01T4F1B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 682.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 |

MACH 1.51

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EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. 01T4B7A1-4 AT ALPHA=0



| | |
|-----------------|---|
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
| (RD7573) | MDAC S-222 COMPOSITE(T-CG) 01T4B7A1-4 |
| (RD7587) | MDAC S-222 COMPOSITE(T-CG) 01T4F1B7A1-4 |

| | | | |
|-------|--------|--------|--------|
| ALPHA | ELEVTR | AILRON | RUDDER |
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

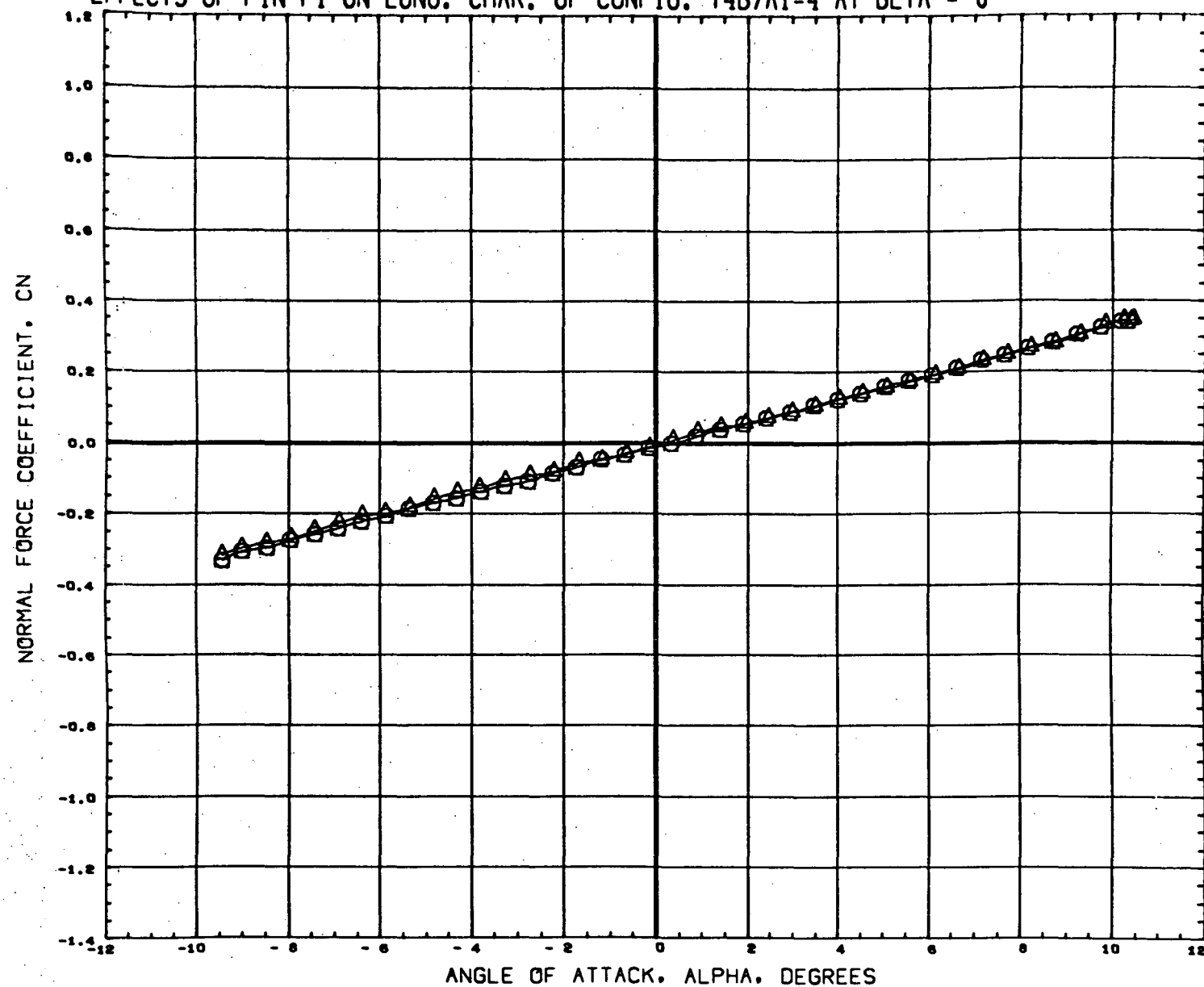
| | |
|-----------------------|------------------|
| REFERENCE INFORMATION | |
| SREF | 3155.3040 SQ.FT. |
| LREF | 609.9004 IN. |
| BREF | 882.0004 IN. |
| XMRP | 557.0004 IN. |
| YMRP | 0.0000 IN. |
| ZMRP | 200.0004 IN. |
| SCALE | 0.0060 |

MACH

2.20

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EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD7588) | MDAC S-222 COMPOSITE (T-CG) T4B7A1-4 |
| (CD7590) | MDAC S-222 COMPOSITE (T-CG) T4F1B7A1-4 |

| BETA |
|-------|
| 0.000 |
| 0.000 |

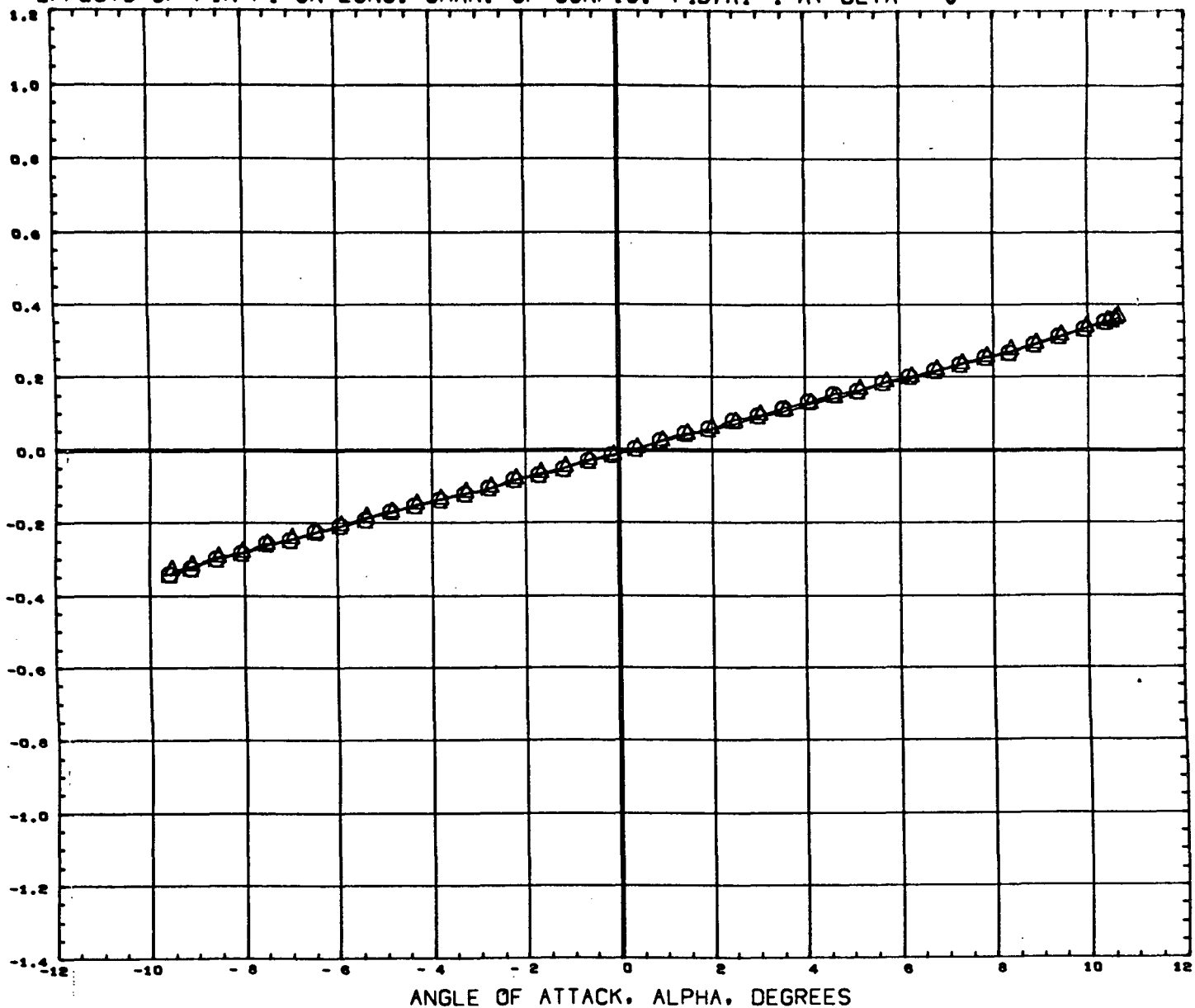
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH .58

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EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0

NORMAL FORCE COEFFICIENT, CN



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
 (CD7590) MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4

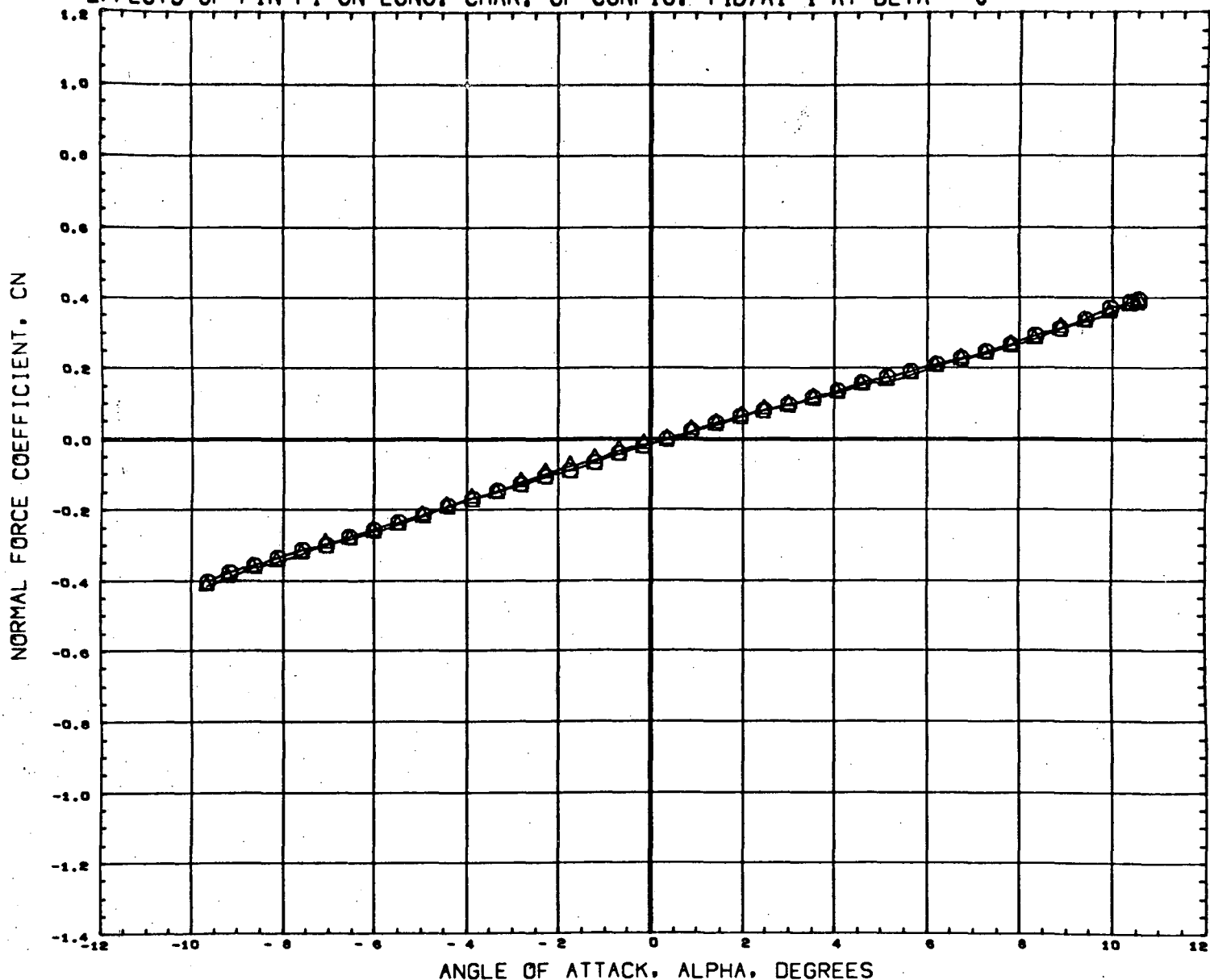
BETA
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 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 862.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH .90

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EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD7588) ○ | MDAC S-222 COMPOSITE (T-CG) T4B7A1-4 |
| (CD7590) △ | MDAC S-222 COMPOSITE (T-CG) T4F1B7A1-4 |

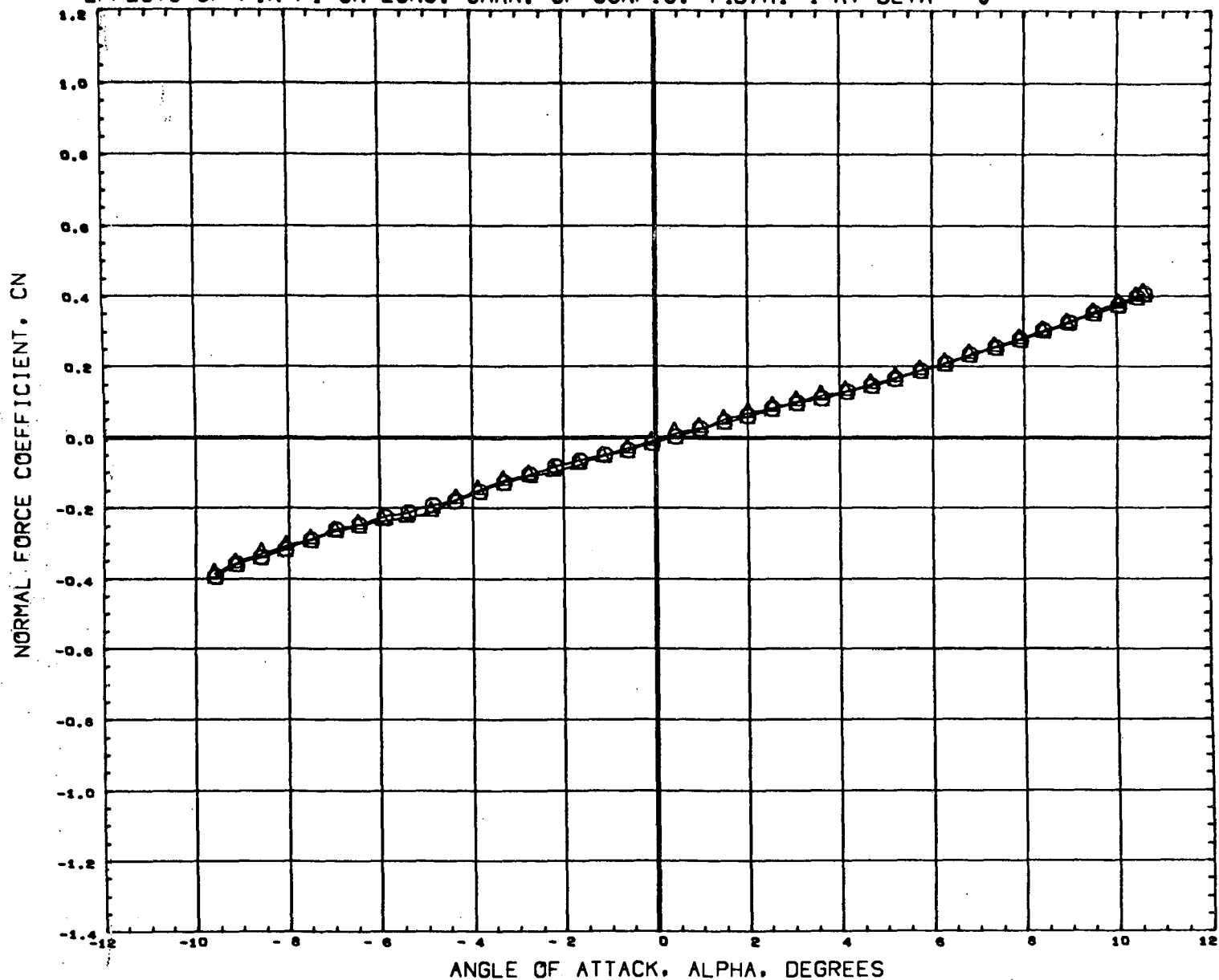
| BETA |
|-------|
| 0.000 |
| 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|---------|
| SREF | 3155.3040 | SQ. FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH 1.09

PAGE 345

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) Q MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
 (CD7590) A MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4

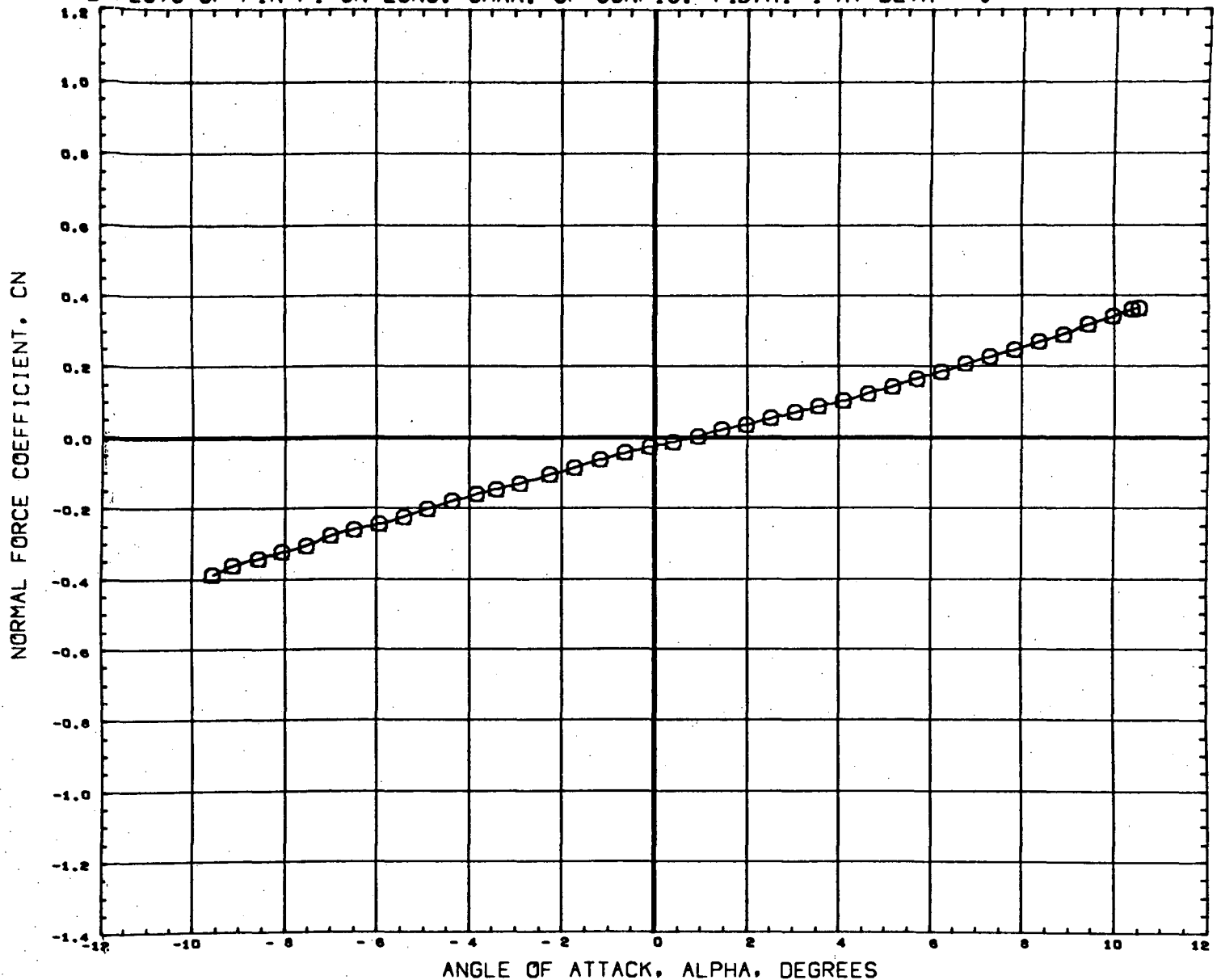
BETA
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REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH 1.51

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EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) ○ MDAC S-222 COMPOSITE (T-CG) T4B7A1-4
 (CD7590) △ DATA NOT AVAILABLE FOR ALL CONDITIONS

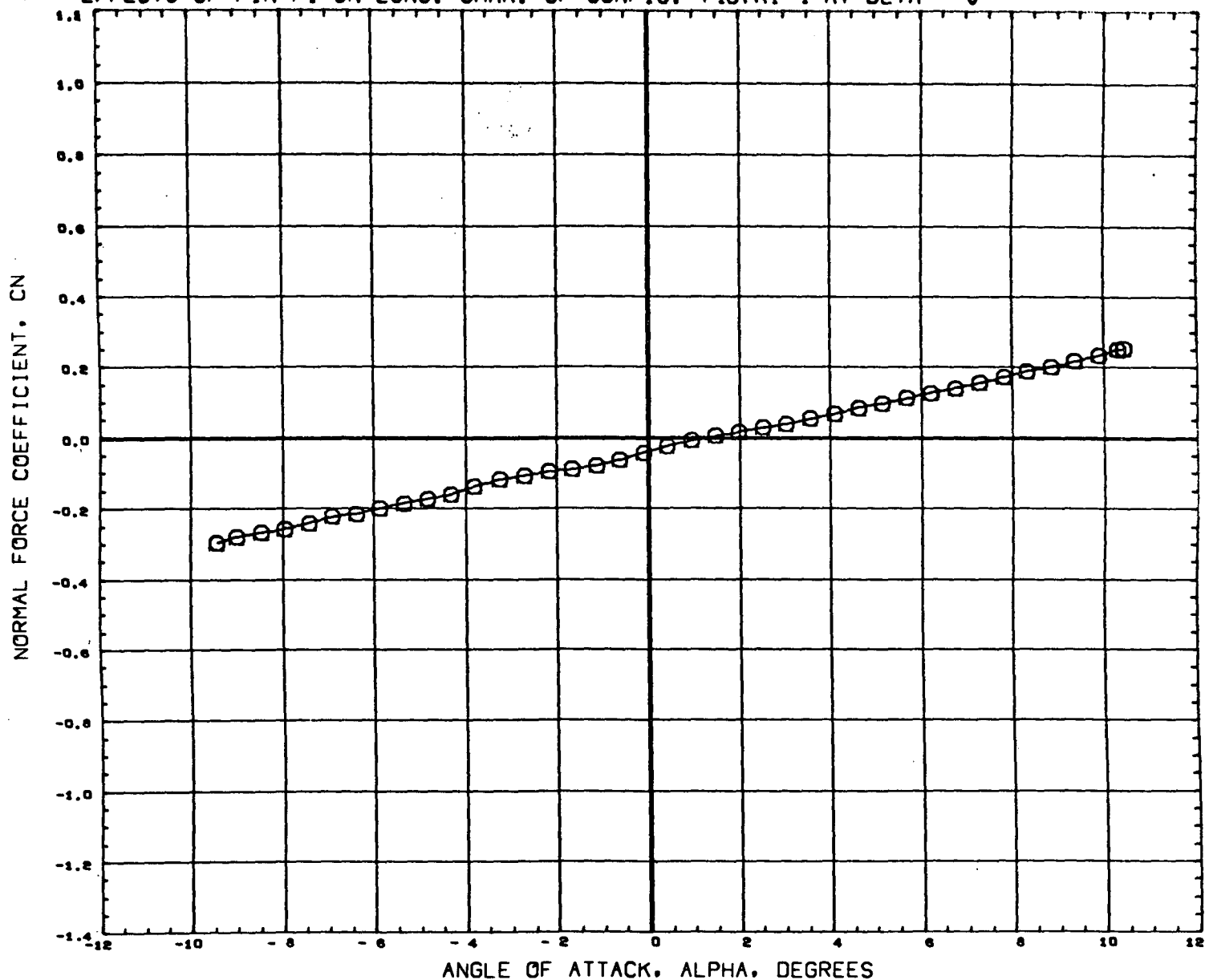
BETA
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REFERENCE INFORMATION
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 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH 2.20

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EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T487A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) MDAC S-222 COMPOSITE (T-CG) T487A1-4
 (CD7590) DATA NOT AVAILABLE FOR ALL CONDITIONS

BETA
 0.000
 0.000

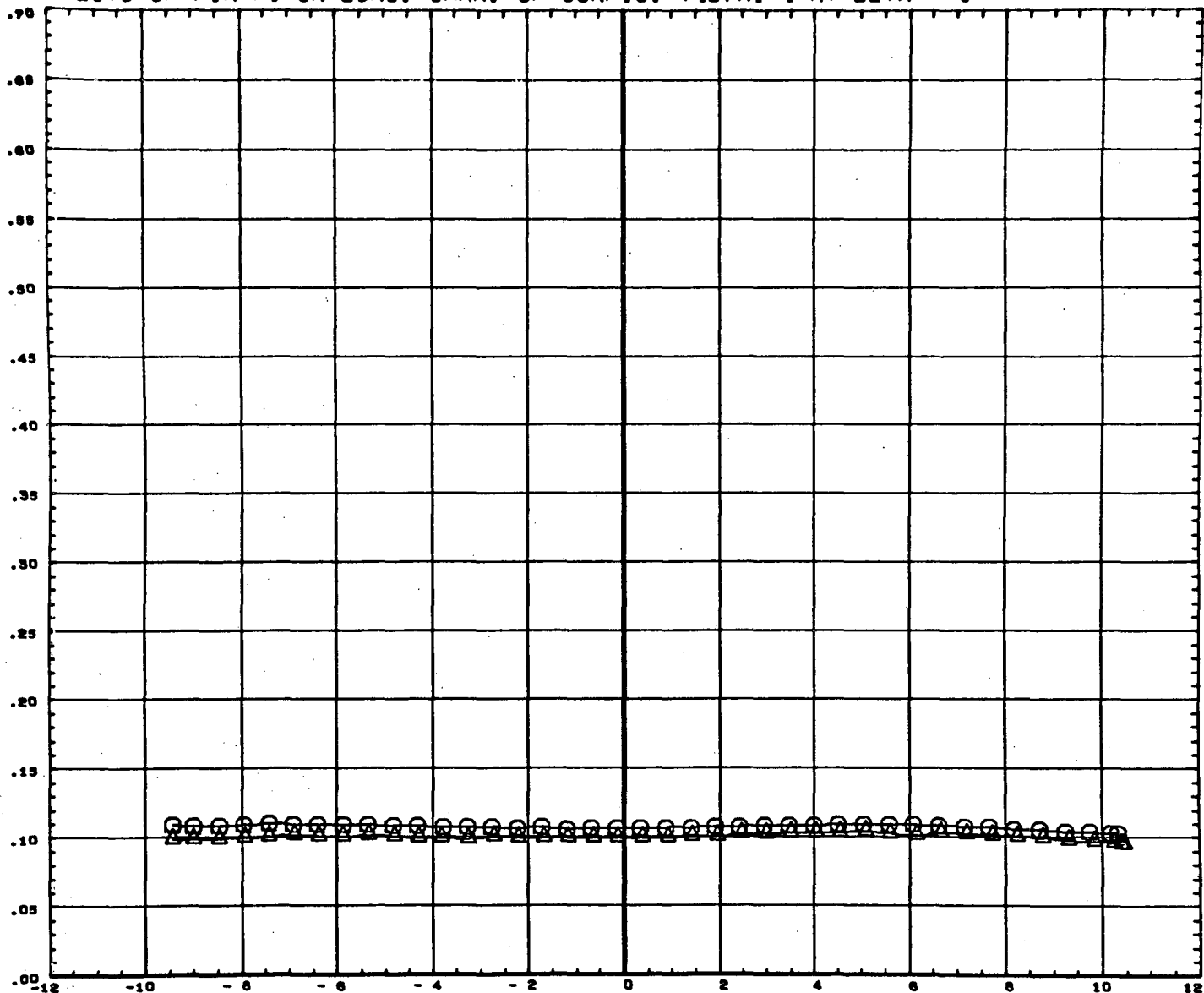
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 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 357.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH 4.47

PAGE 348

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0

AXIAL FORCE COEFFICIENT, CA



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
 (CD7590) MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4

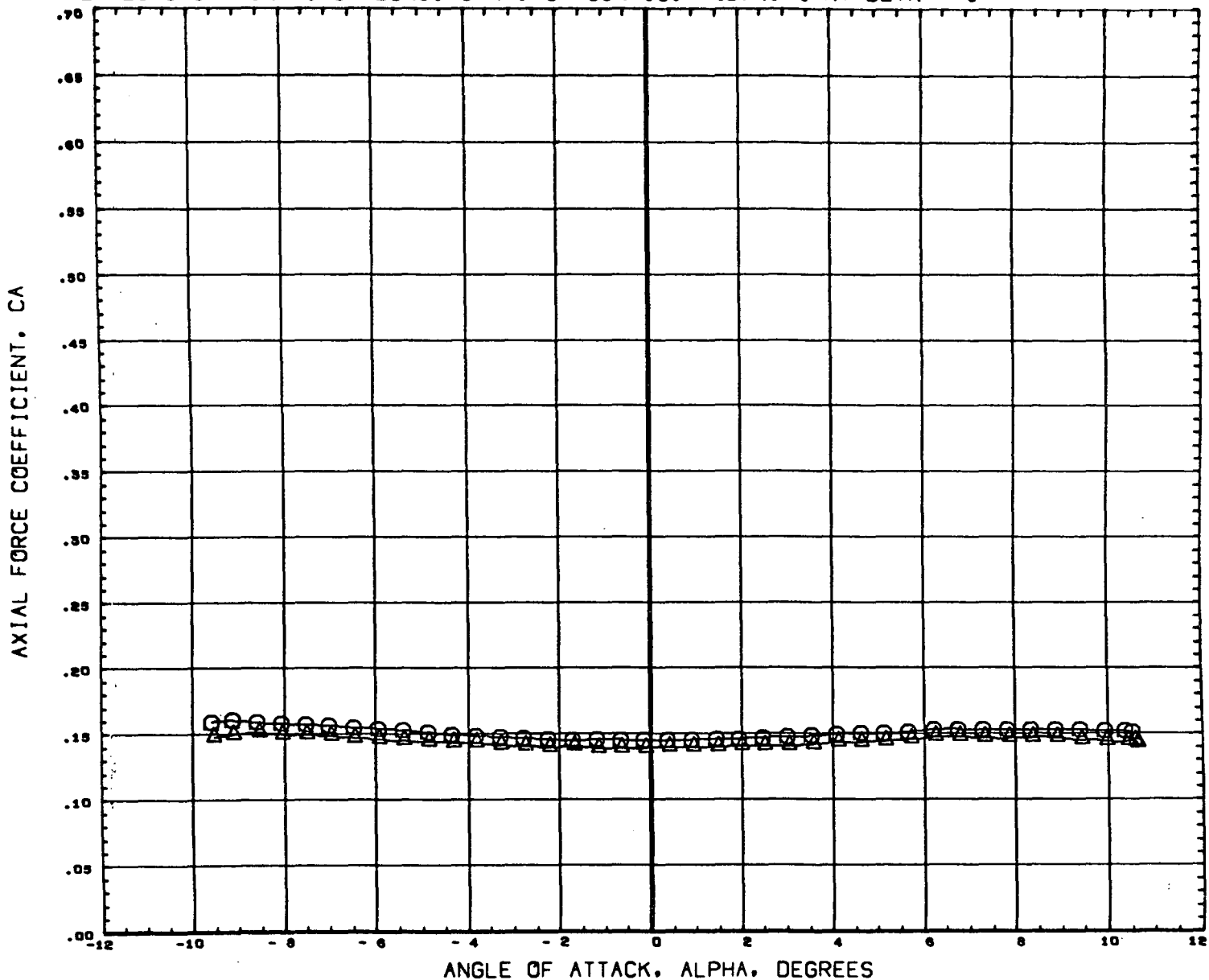
BETA
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REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH .58

PAGE 349

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
(CD7588) MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
(CD7590) MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4

BETA
0.000
0.000

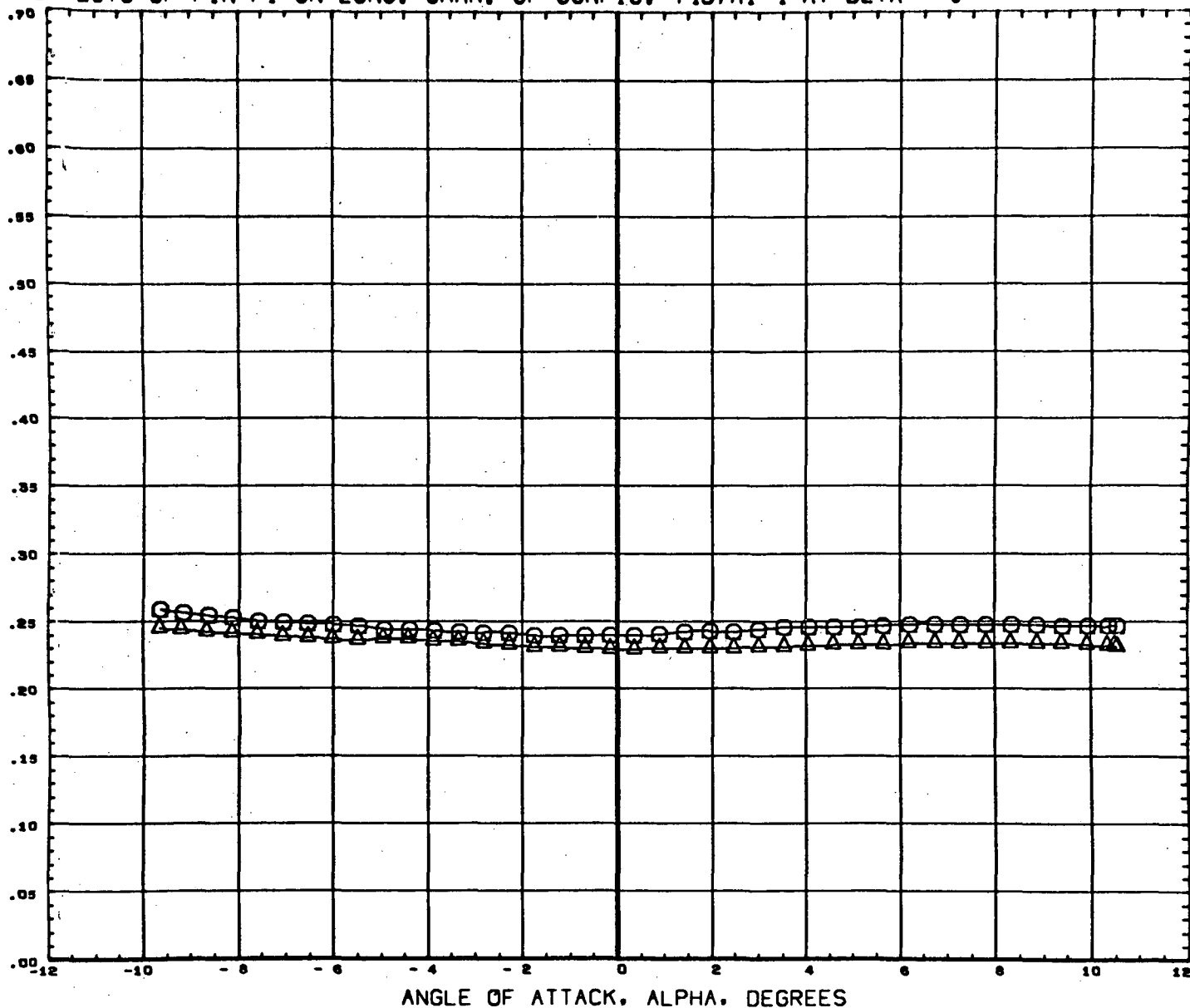
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LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060

MACH .90

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EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0

AXIAL FORCE COEFFICIENT, CA



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---------------------------------------|
| (CD7588) | MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (CD7590) | MDAC S-222 COMPOSITE(T-CG) T4F187A1-4 |

| BETA |
|-------|
| 0.000 |
| 0.000 |

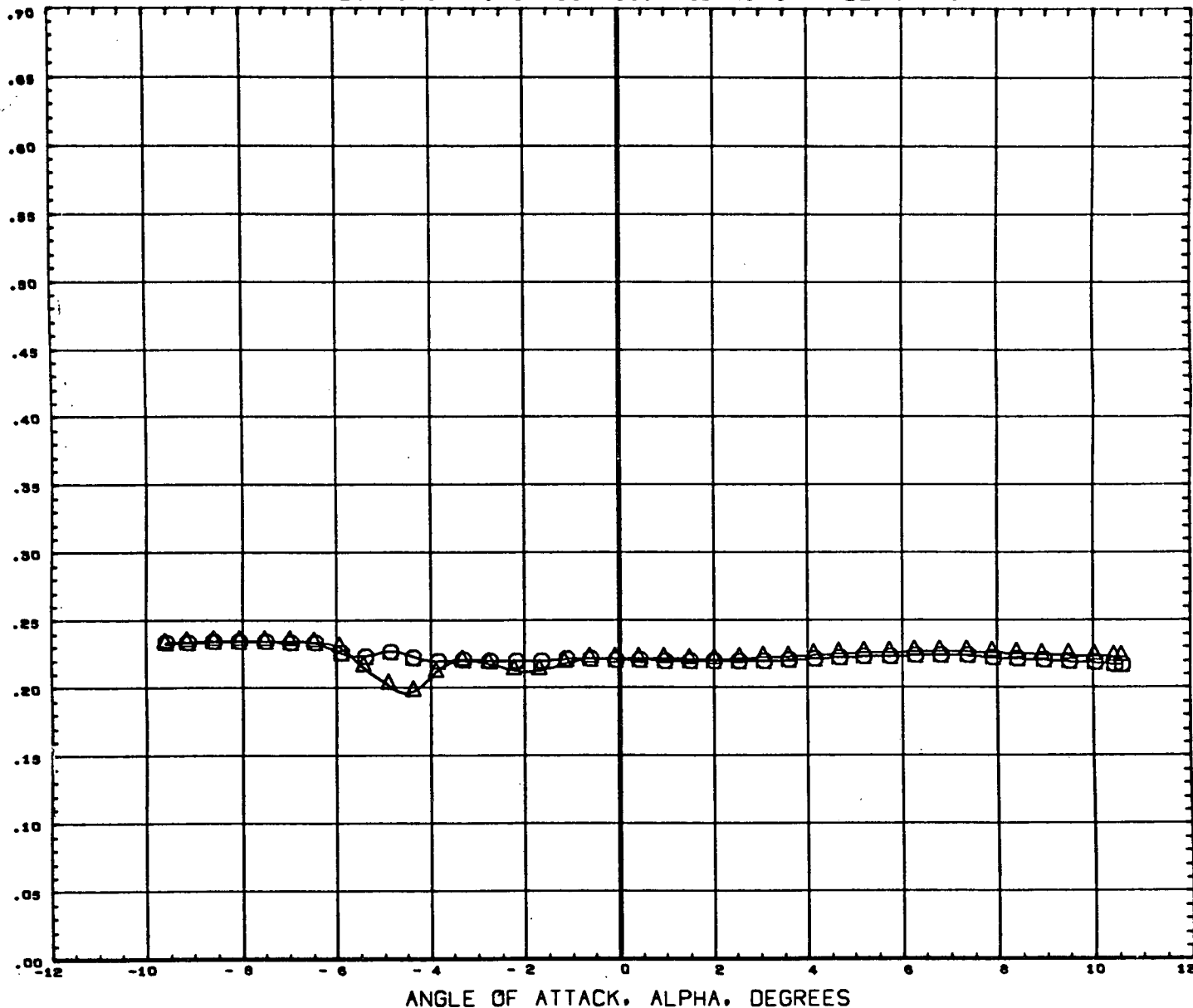
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|-----------------------|-----------|--------|
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| LREF | 609.5004 | in. |
| BREF | 882.0004 | in. |
| XMRP | 937.0004 | in. |
| YMRP | 0.0000 | in. |
| ZMRP | 200.0004 | in. |
| SCALE | 0.0060 | |

MACH 1.09

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EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0

AXIAL FORCE COEFFICIENT, CA



DATA SET SYMBOL CONFIGURATION DESCRIPTION
(CD7588) MDAC S-222 COMPOSITE (T-CG) T4B7A1-4
(CD7590) MDAC S-222 COMPOSITE (T-CG) T4F1B7A1-4

BETA
0.000
0.000

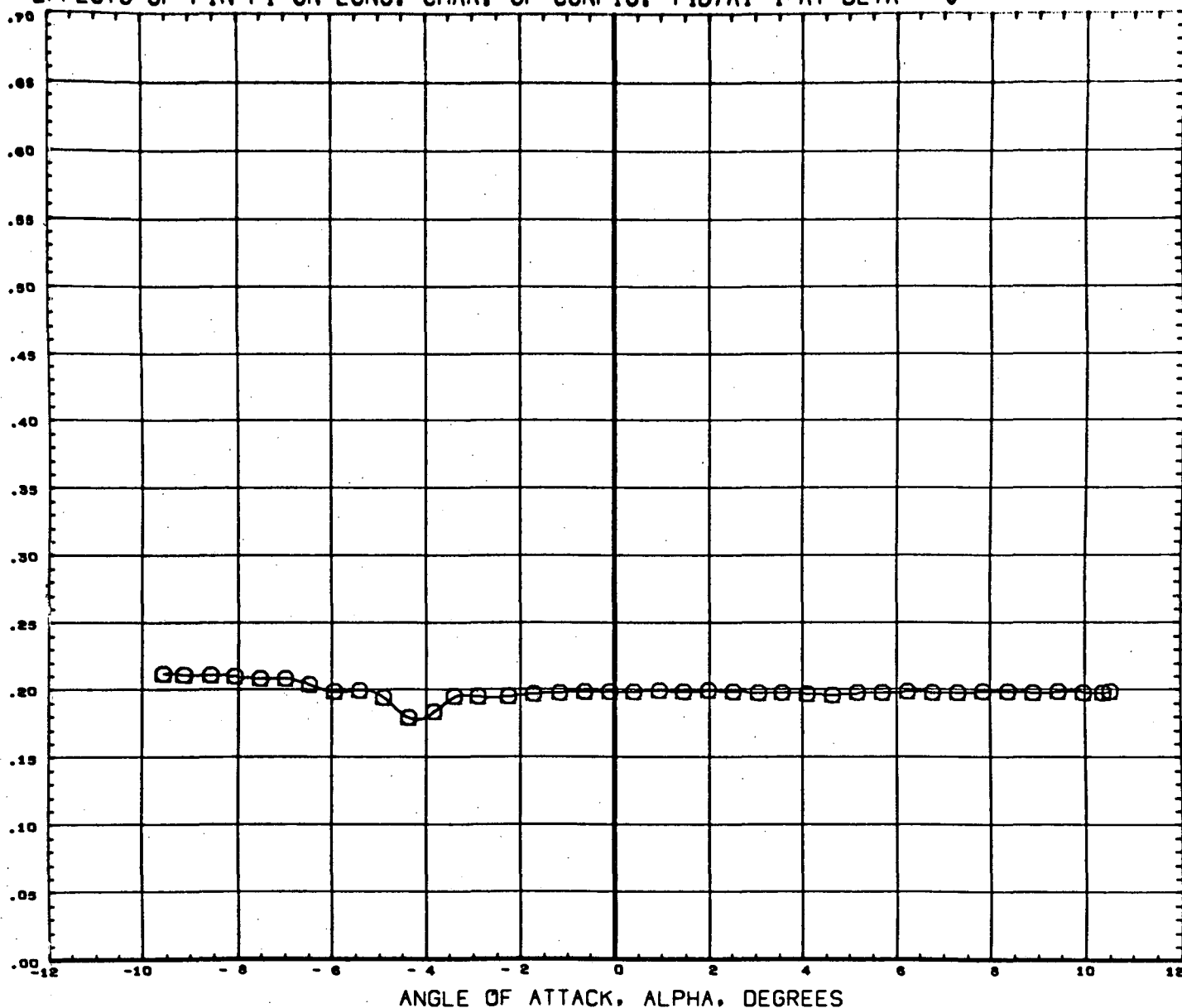
REFERENCE INFORMATION
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BREF 882.0004 IN.
XMRP 937.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060

MACH 1.51

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EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0

AXIAL FORCE COEFFICIENT, CA



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
 (CD7590) DATA NOT AVAILABLE FOR ALL CONDITIONS

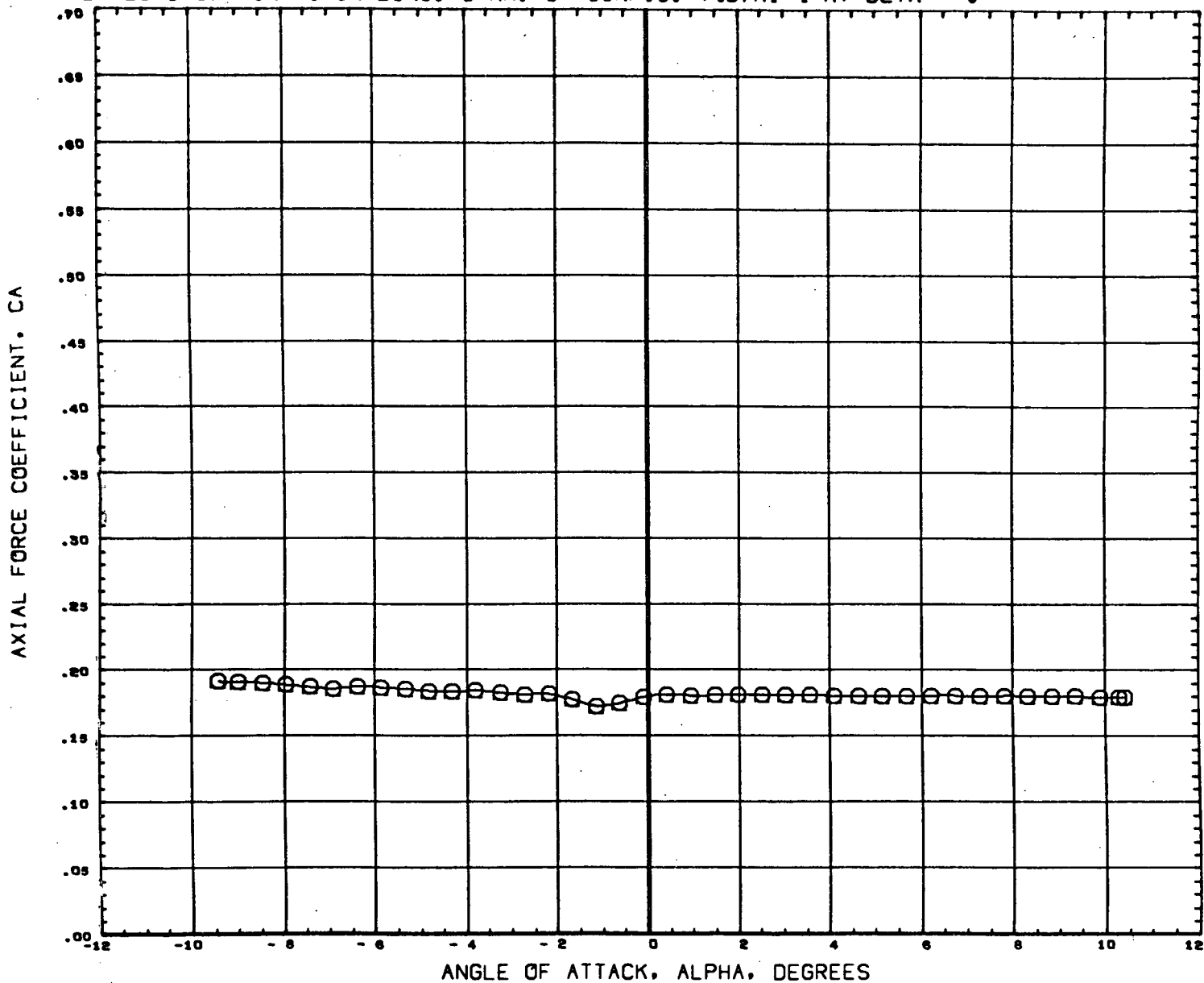
BETA
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REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 662.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH 2.20

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EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



DATA SET SYMBOL (CD7588) (CD7590) CONFIGURATION DESCRIPTION MDAC S-222 COMPOSITE (T-CG) T4B7A1-4 DATA NOT AVAILABLE FOR ALL CONDITIONS

BETA 0.000 0.000

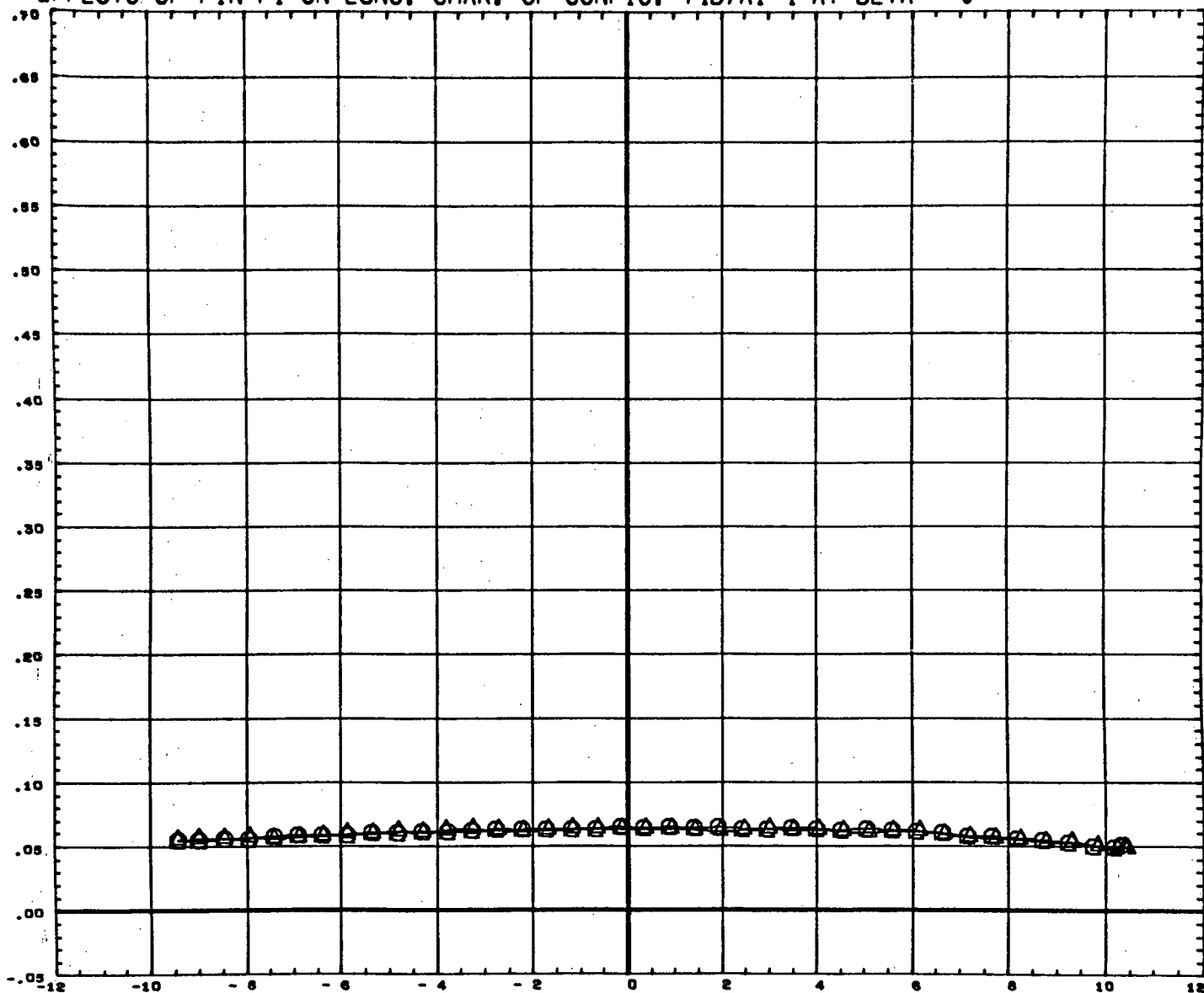
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 XMRP 937.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH 4.47

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EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
 (CD7590) MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4

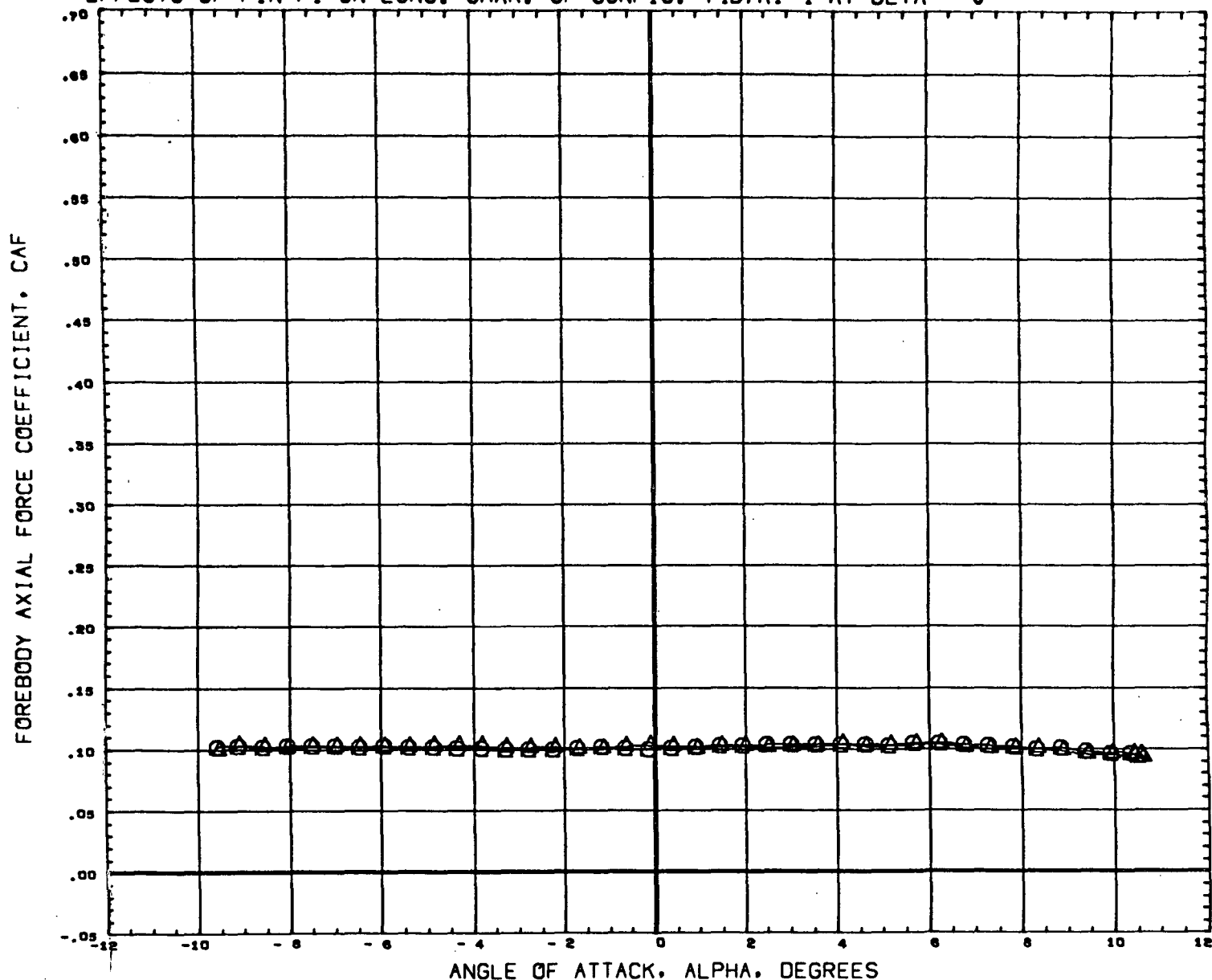
BETA
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REFERENCE INFORMATION
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 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH .58

PAGE 355

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) Q MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
 (CD7590) MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4

BETA
 0.000
 0.000

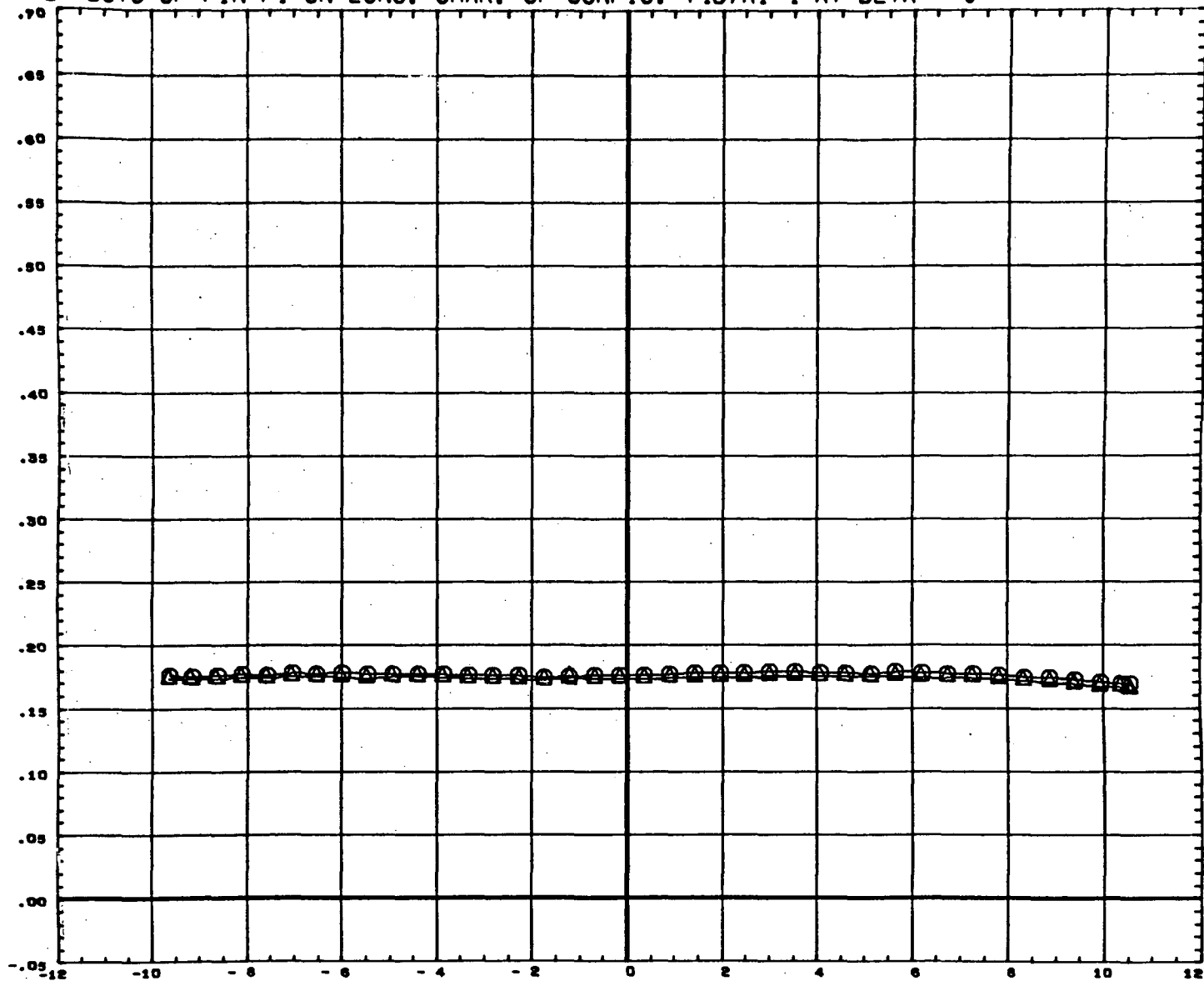
REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH .90

PAGE 356

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



DATA SET SYMBOL CONFIGURATION DESCRIPTION
(CD7588) \square MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
(CD7590) \triangle MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4

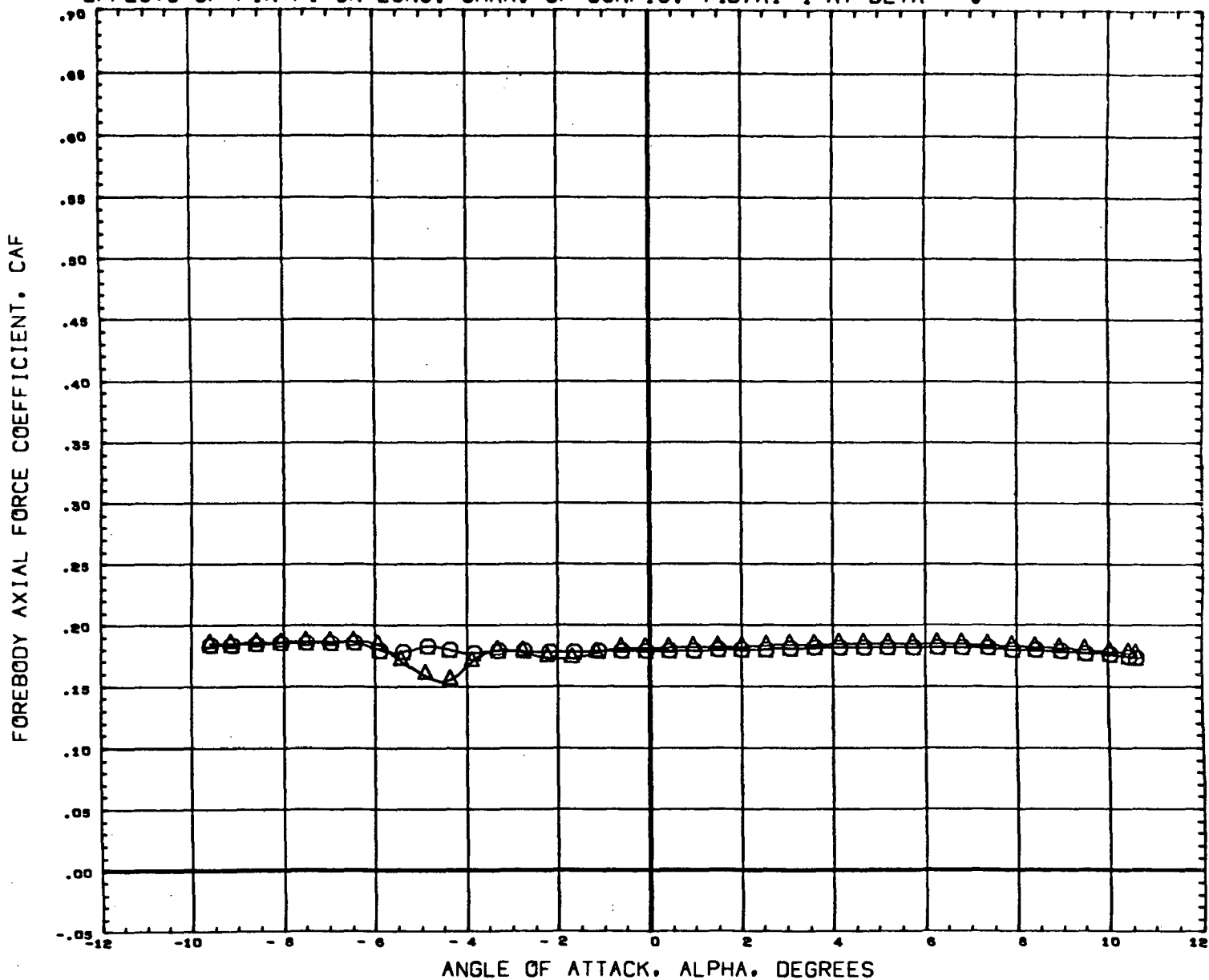
BETA
0.000
0.000

REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060

MACH 1.09

PAGE 357

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD7588) | MDAC S-222 COMPOSITE (T-CG) T4B7A1-4 |
| (CD7590) | MDAC S-222 COMPOSITE (T-CG) T4F1B7A1-4 |

| BETA |
|-------|
| 0.000 |
| 0.000 |

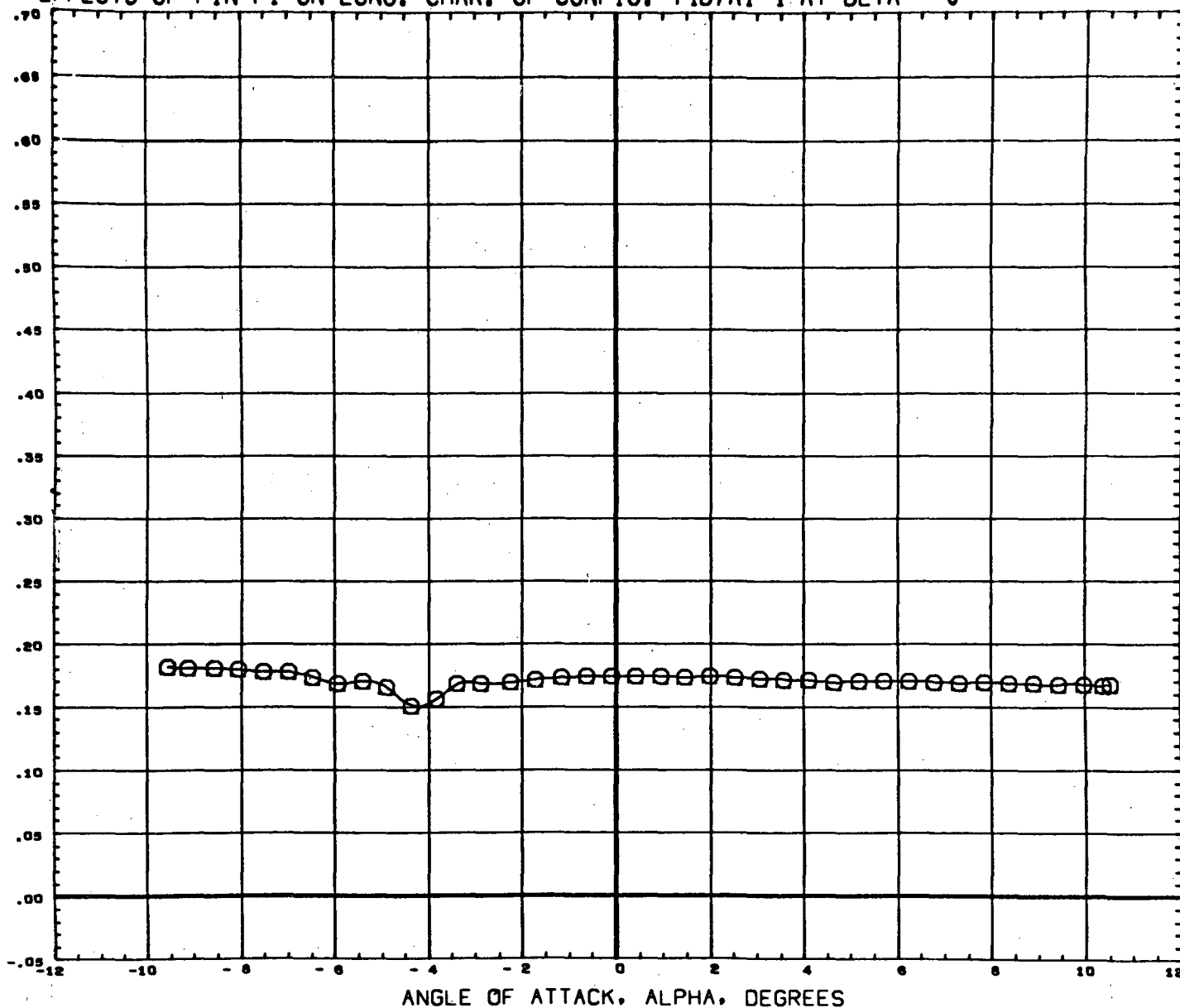
| REFERENCE INFORMATION | | |
|-----------------------|-----------|---------|
| SREF | 3155.3040 | SQ. FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH 1.51

PAGE 358

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
 (CD7590) DATA NOT AVAILABLE FOR ALL CONDITIONS

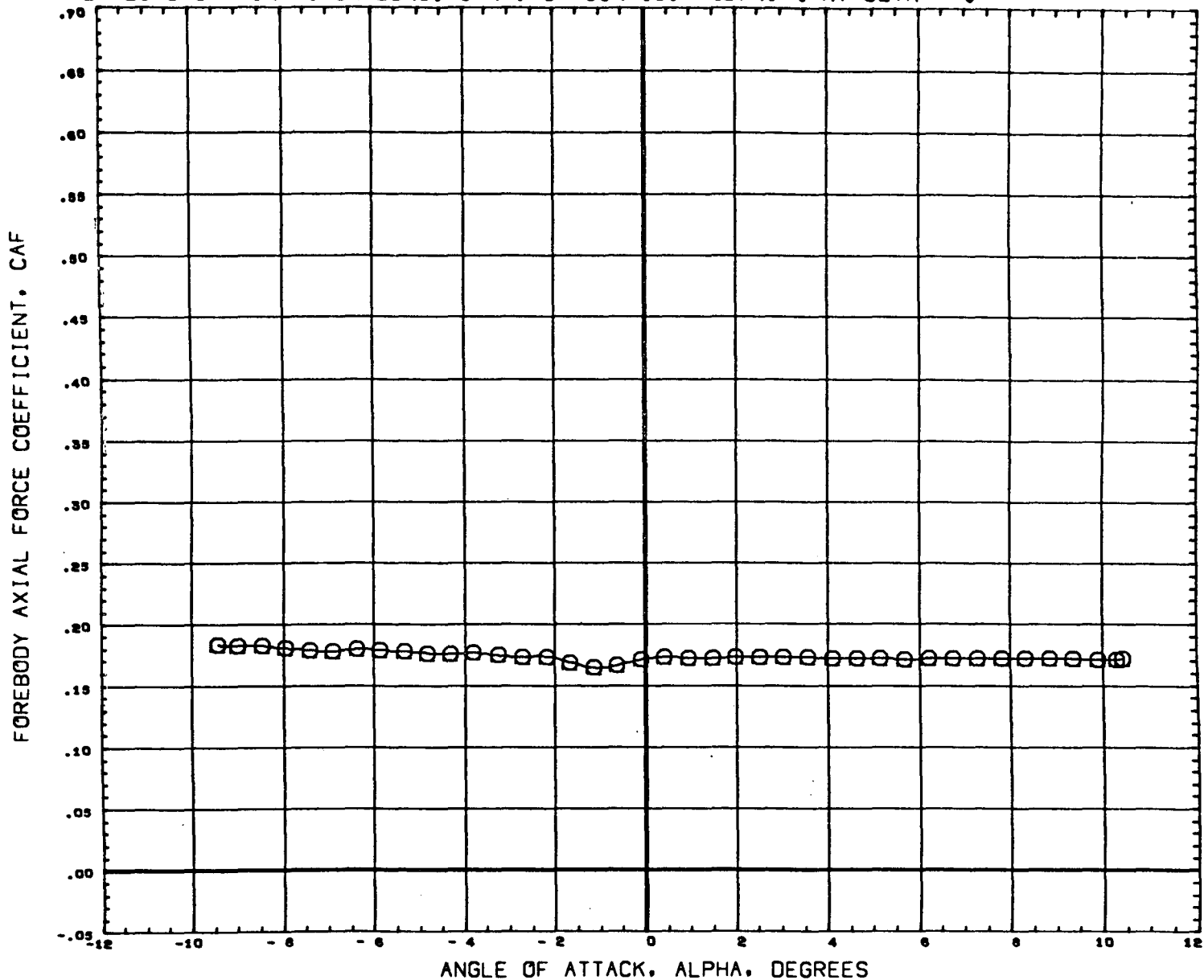
BETA
 0.000
 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH 2.20

PAGE 359

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
 (CD7590) DATA NOT AVAILABLE FOR ALL CONDITIONS

BETA
 0.000
 0.000

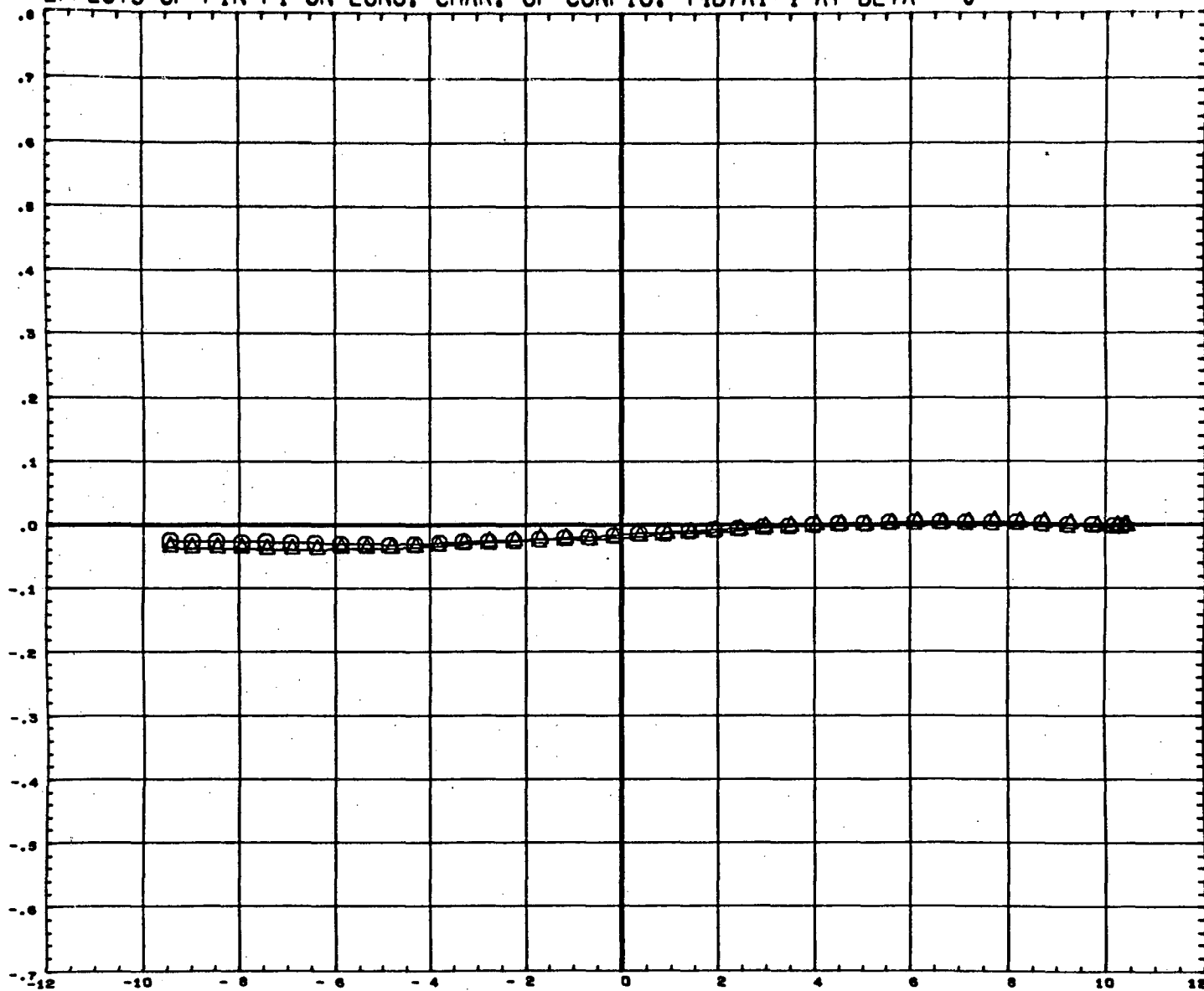
REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060



MACH 4.47

PAGE 360

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0

PITCHING MOMENT COEFFICIENT, CLM



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|--|---------------------------------------|
| (CD7588)  | MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (CD7590)  | MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4 |

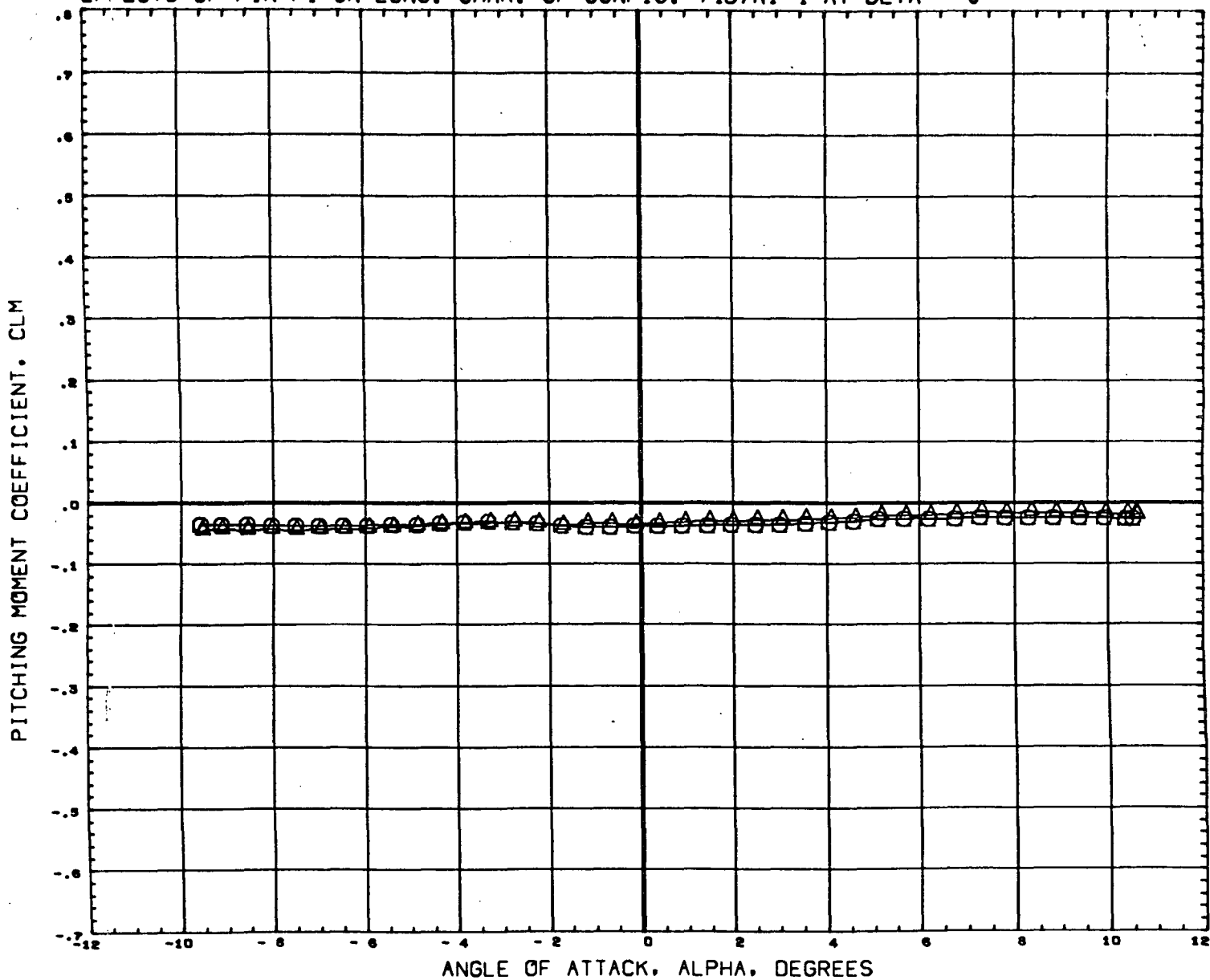
BETA
0.000
0.000

| REFERENCE INFORMATION | | |
|-----------------------|-----------|---------|
| SREF | 3155.3040 | SQ. FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRF | 337.0004 | IN. |
| YMRF | 0.0000 | IN. |
| ZMRF | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH .58

PAGE 361

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



| | |
|-----------------|--|
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
| (CD7588) | MDAC S-222 COMPOSITE (T-CG) T4B7A1-4 |
| (CD7590) | MDAC S-222 COMPOSITE (T-CG) T4F1B7A1-4 |

BETA
0.000
0.000

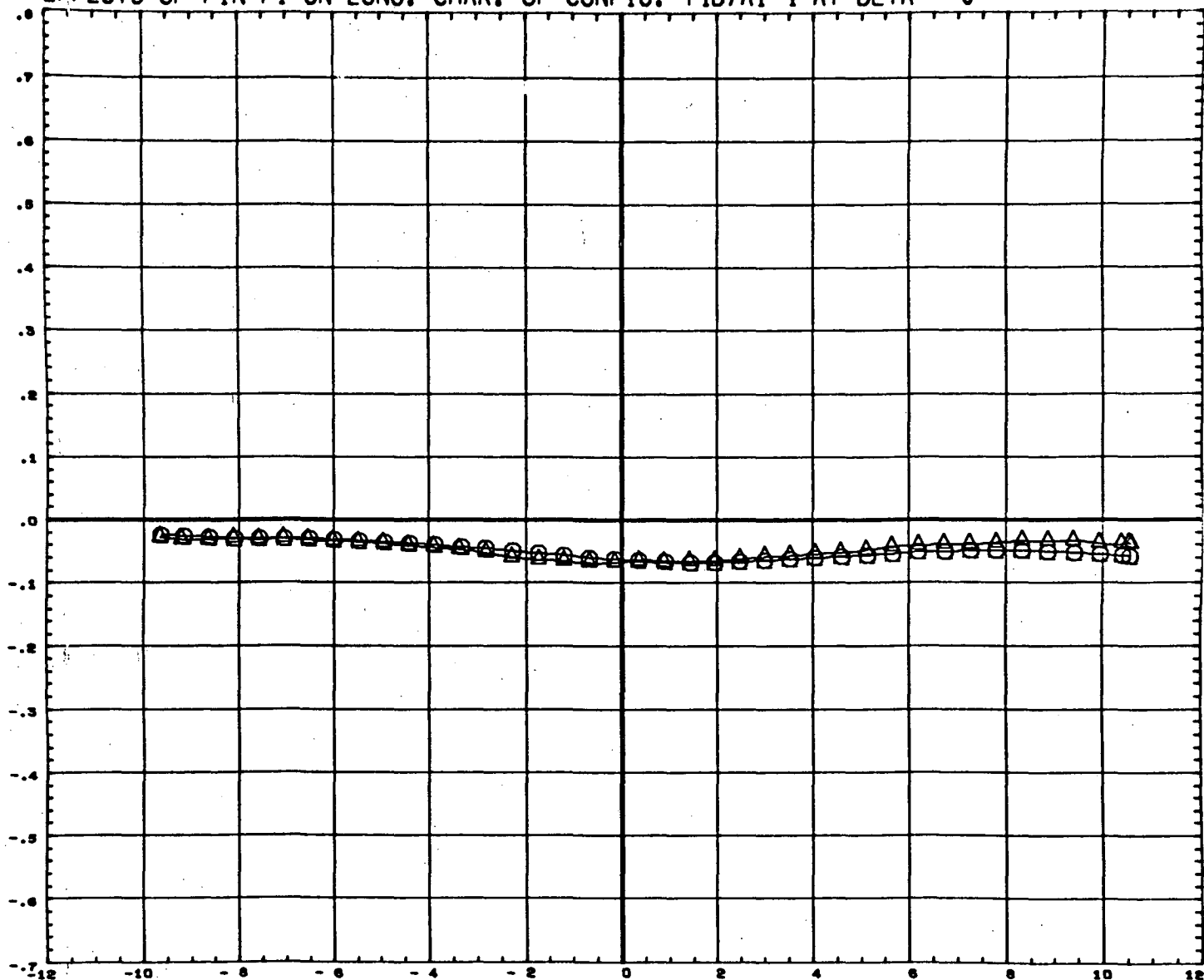
| REFERENCE INFORMATION | | |
|-----------------------|-----------|---------|
| SREF | 3155.3040 | SQ. FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH .90

PAGE 362

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0

PITCHING MOMENT COEFFICIENT, CLM



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---------------------------------------|
| (CD7588) | MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (CD7590) | MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4 |

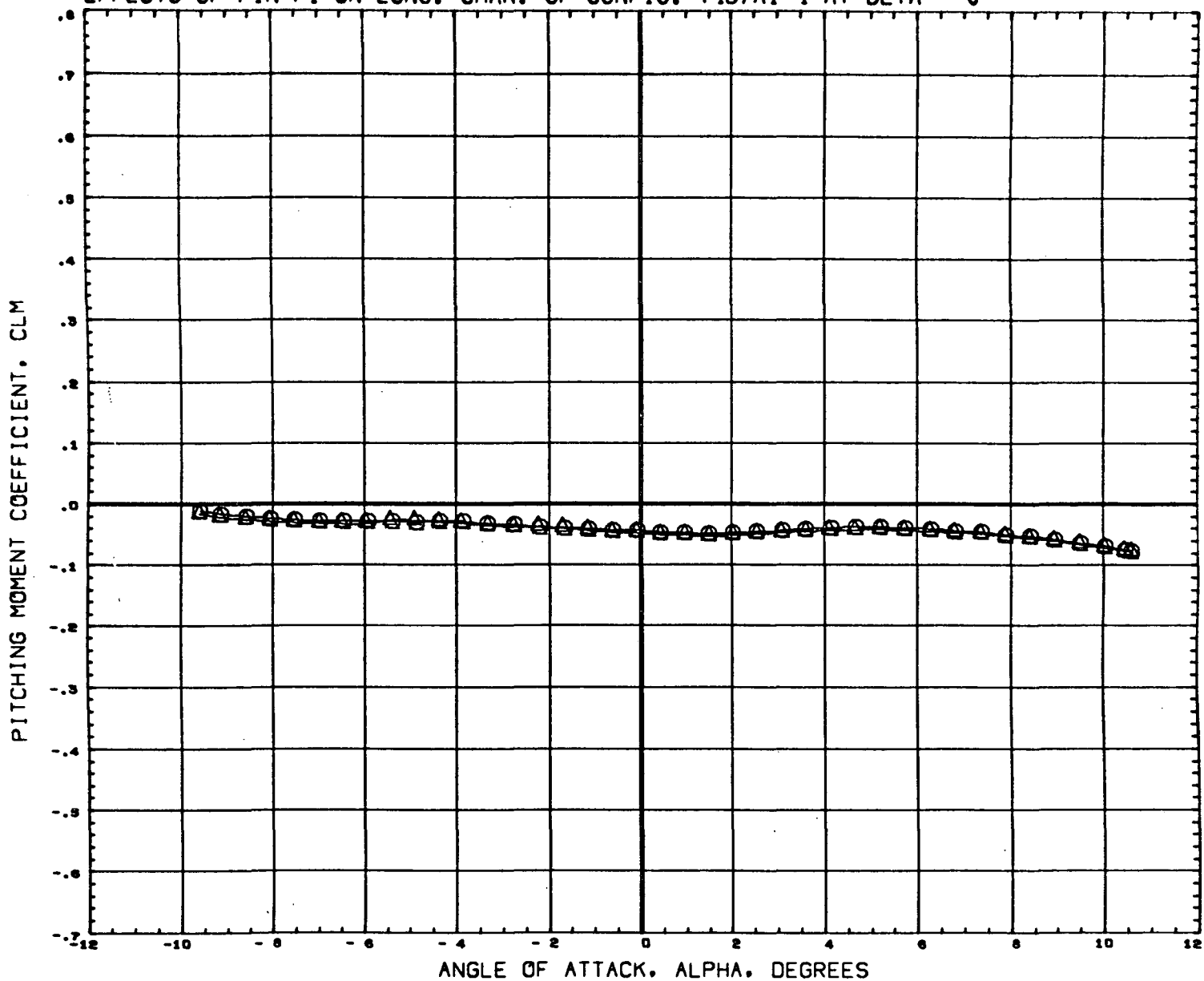
| BETA |
|-------|
| 0.000 |
| 0.000 |



| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH 1.09

PAGE 363

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



| | |
|--|---------------------------------------|
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
| (CD7588)  | MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (CD7590)  | MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4 |

| |
|-------|
| BETA |
| 0.000 |
| 0.000 |

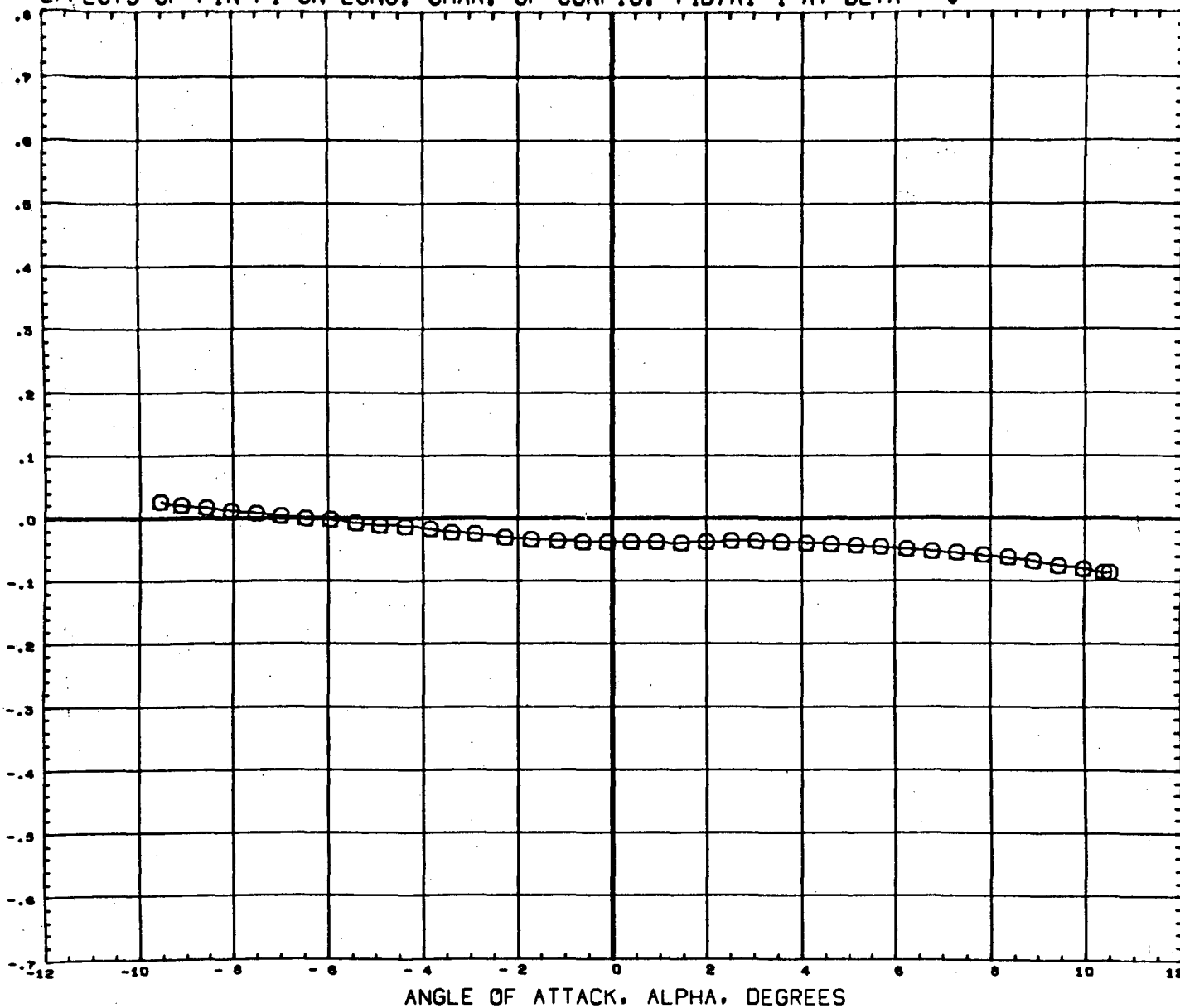
| | | |
|-----------------------|-----------|--------|
| REFERENCE INFORMATION | | |
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH 1.51

PAGE 364

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0

PITCHING MOMENT COEFFICIENT, CLM



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
 (CD7590) DATA NOT AVAILABLE FOR ALL CONDITIONS

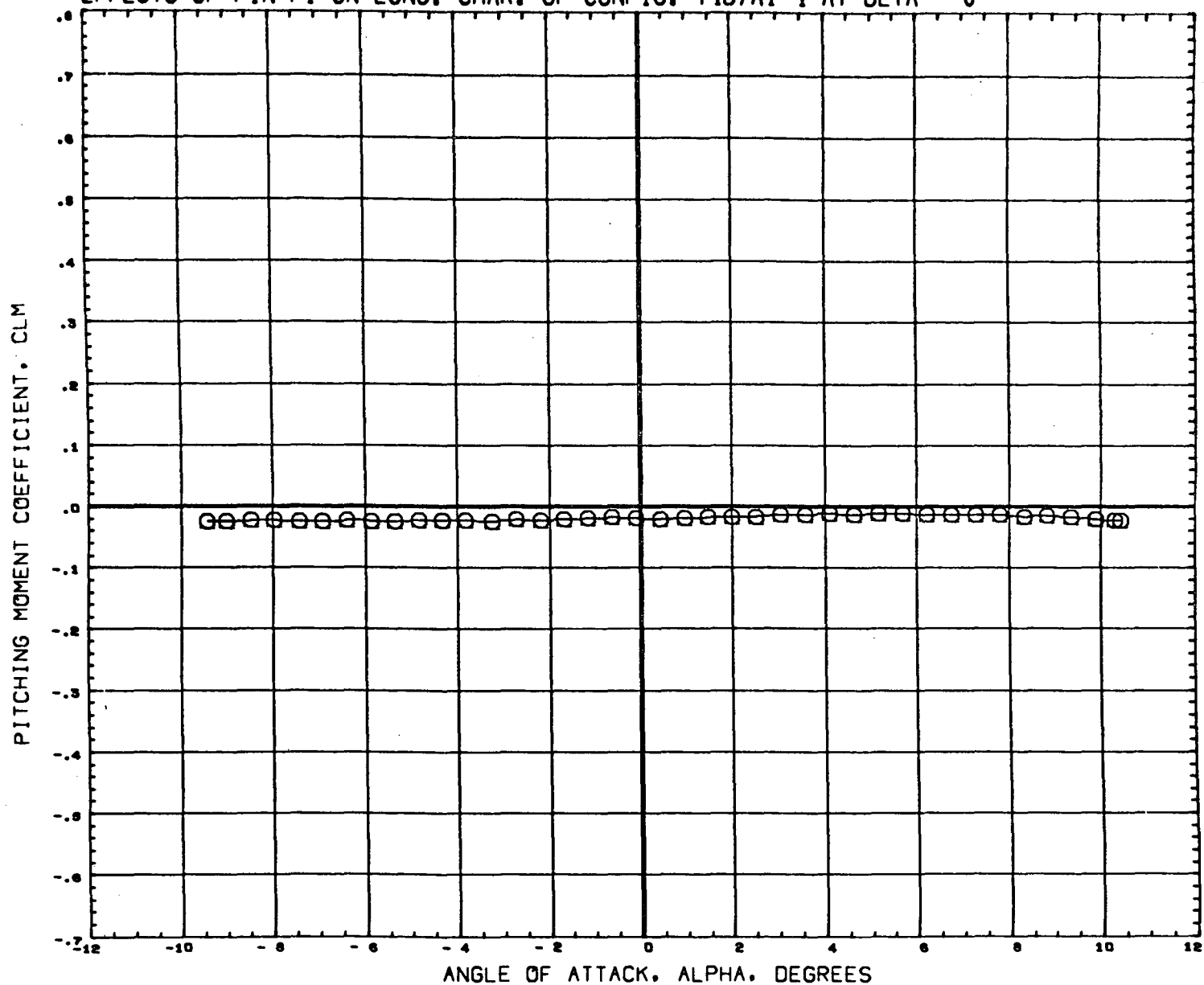
BETA
 0.000
 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 682.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH 2.20

PAGE 365

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) MDAC S-222 COMPOSITE (T-CG) T4B7A1-4
 (CD7590) DATA NOT AVAILABLE FOR ALL CONDITIONS

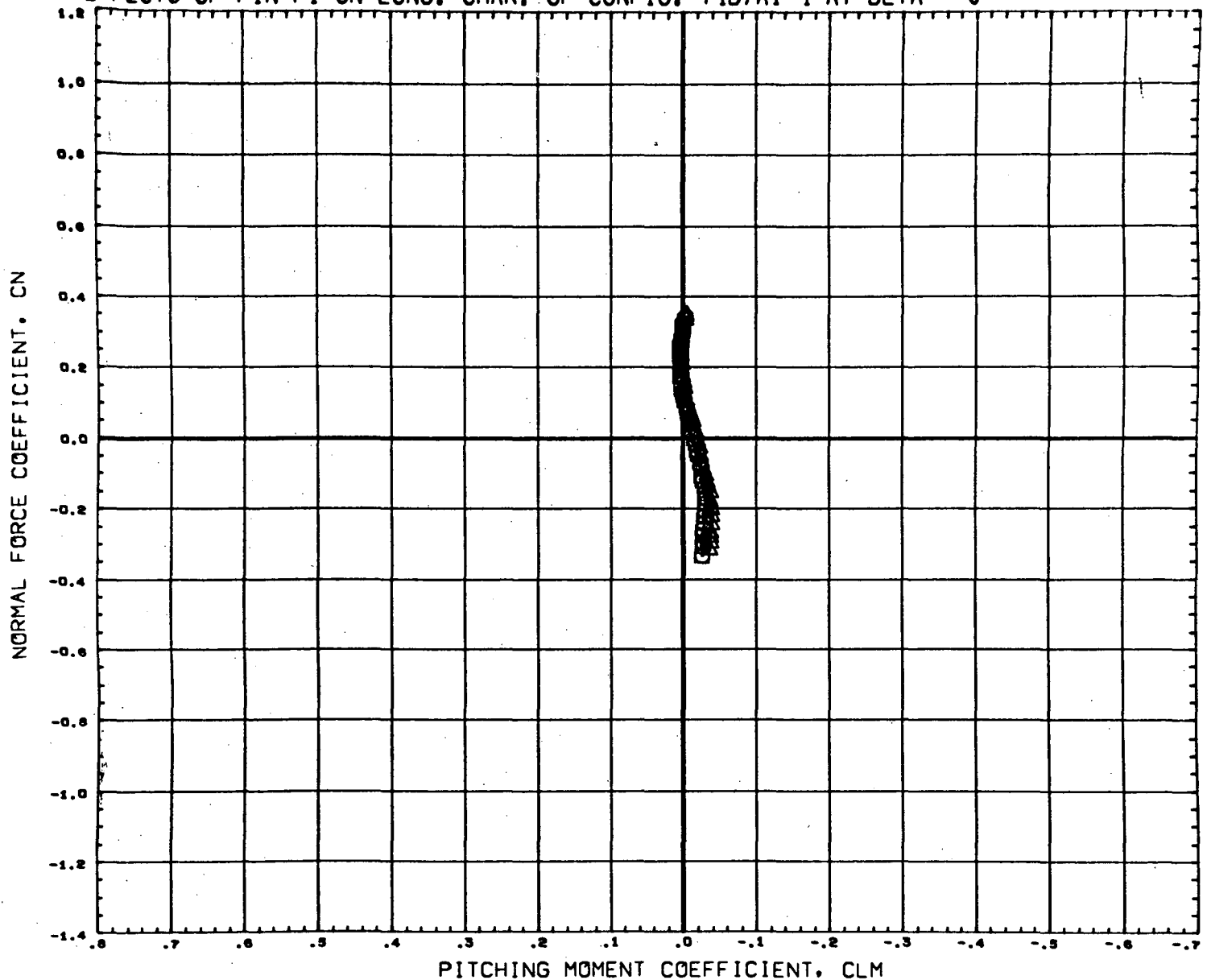
BETA
 0.000
 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ. FT.
 LREF 609.5004 IN.
 BREF 862.0004 IN.
 XMRP 937.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH 4.47

PAGE 366

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---------------------------------------|
| (CD7588) | MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (CD7590) | MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4 |

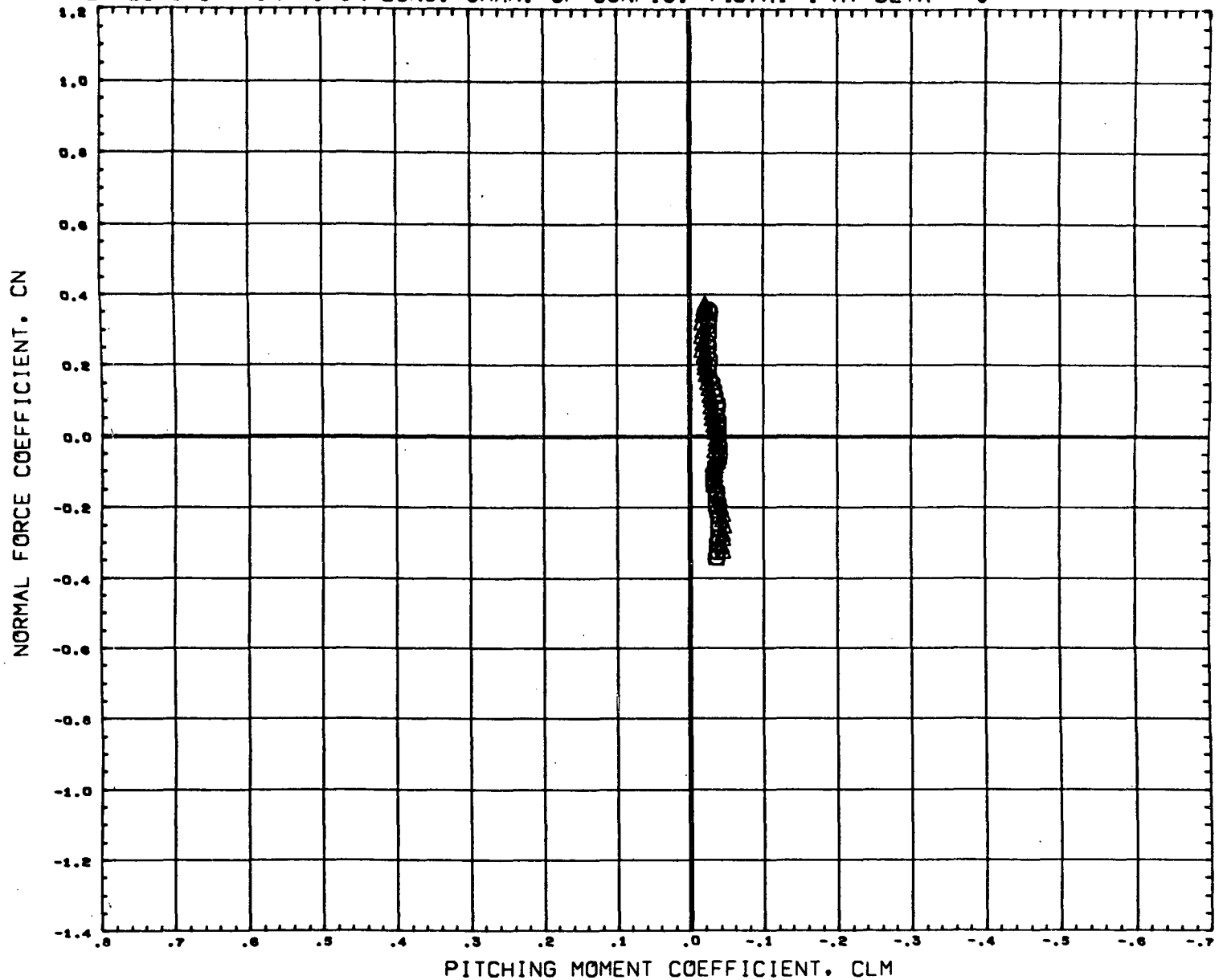
| BETA |
|-------|
| 0.000 |
| 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH .58

PAGE 367

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---------------------------------------|
| (CD7588) | MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (CD7590) | MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4 |

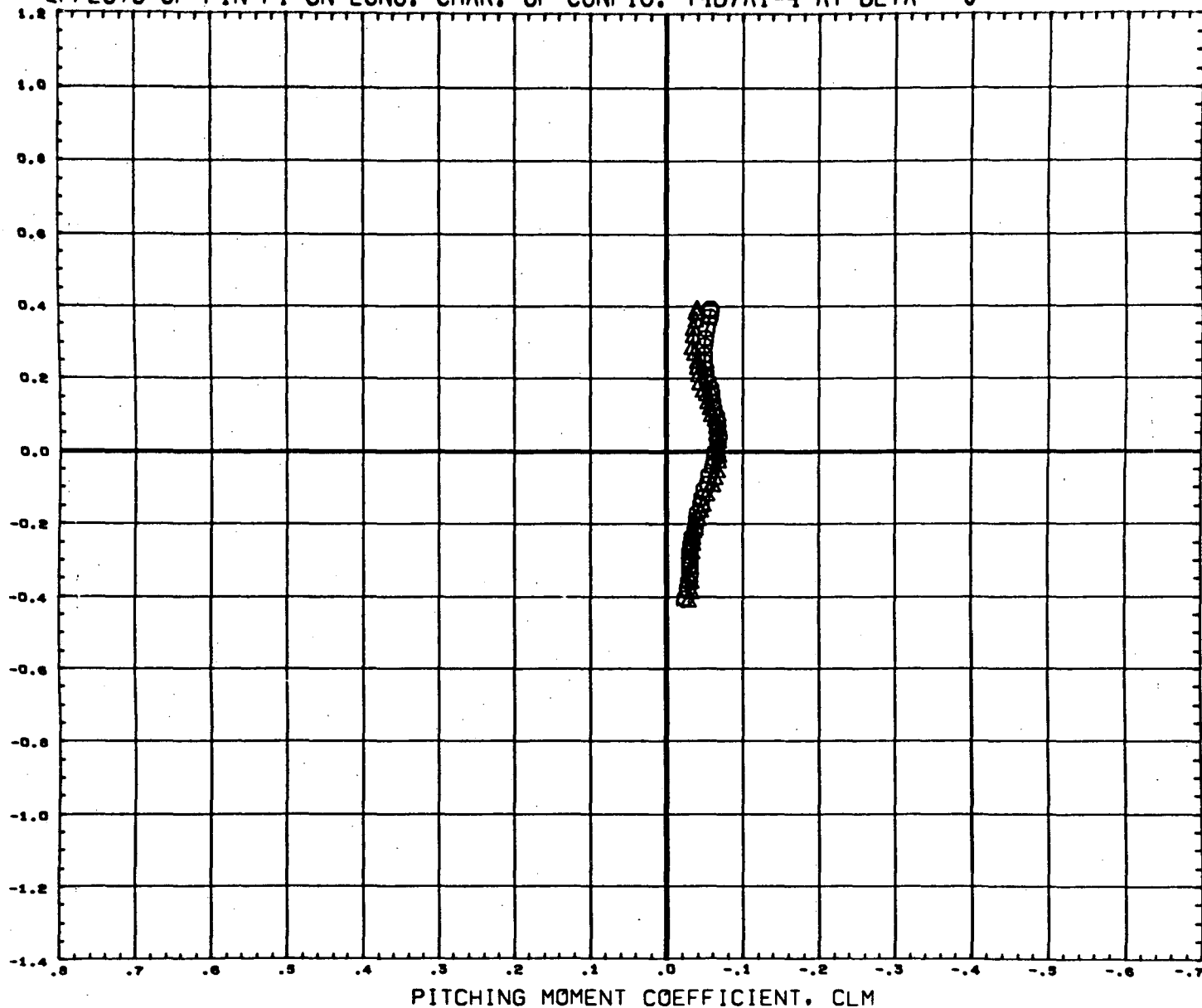
| BETA |
|-------|
| 0.000 |
| 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0080 | |

MACH .90

PAGE 368

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---------------------------------------|
| (CD7588) | MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (CD7590) | MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4 |

| BETA |
|-------|
| 0.000 |
| 0.000 |

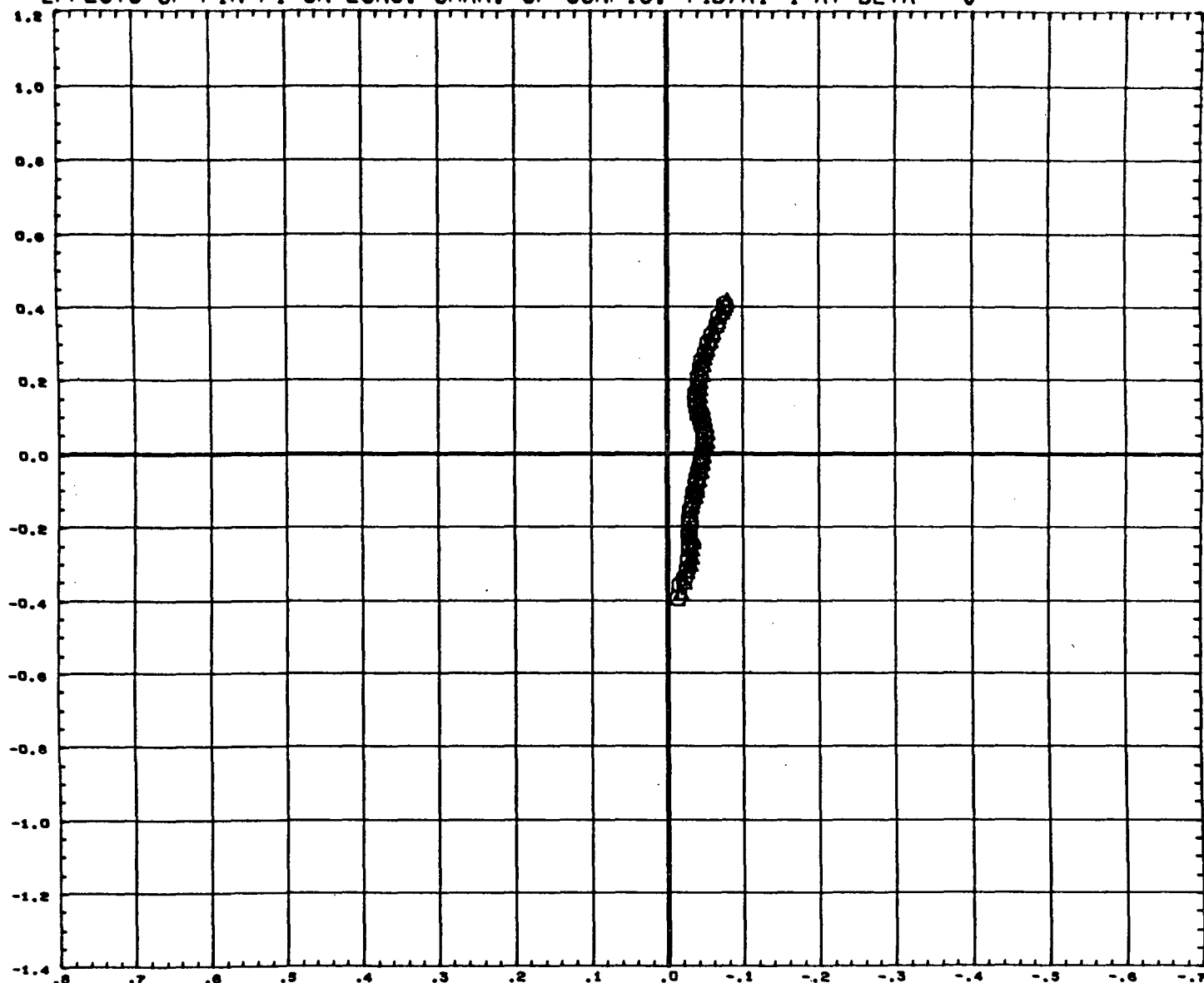
| REFERENCE INFORMATION | | |
|-----------------------|-----------|---------|
| SREF | 3155.3040 | SQ. FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 937.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH 1.09

PAGE 369

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0

NORMAL FORCE COEFFICIENT, CN



PITCHING MOMENT COEFFICIENT, CLM

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---------------------------------------|
| (CD7588) | MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (CD7590) | MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4 |

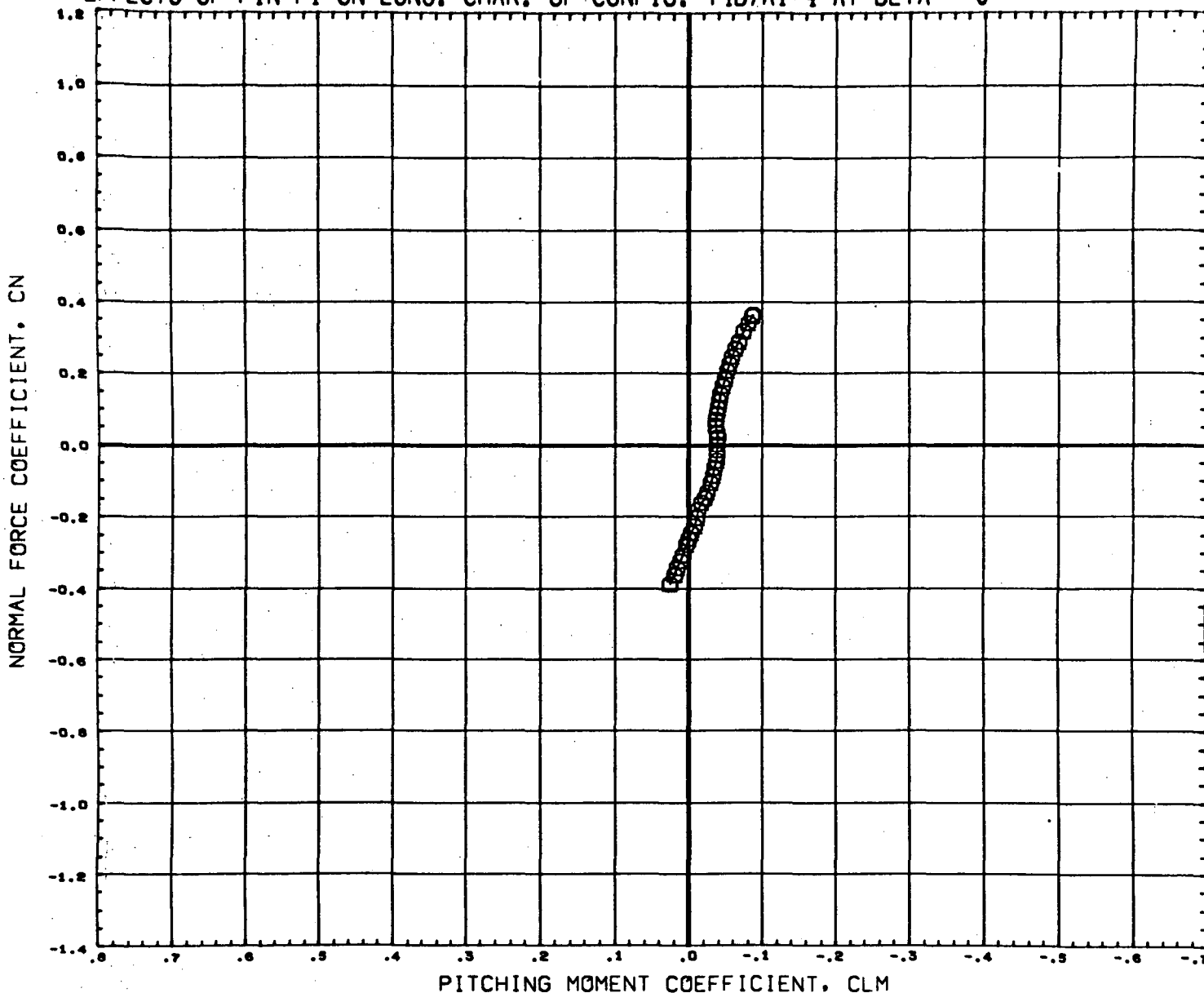
| BETA |
|-------|
| 0.000 |
| 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 537.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH 1.51

PAGE 370

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
 (CD7590) DATA NOT AVAILABLE FOR ALL CONDITIONS

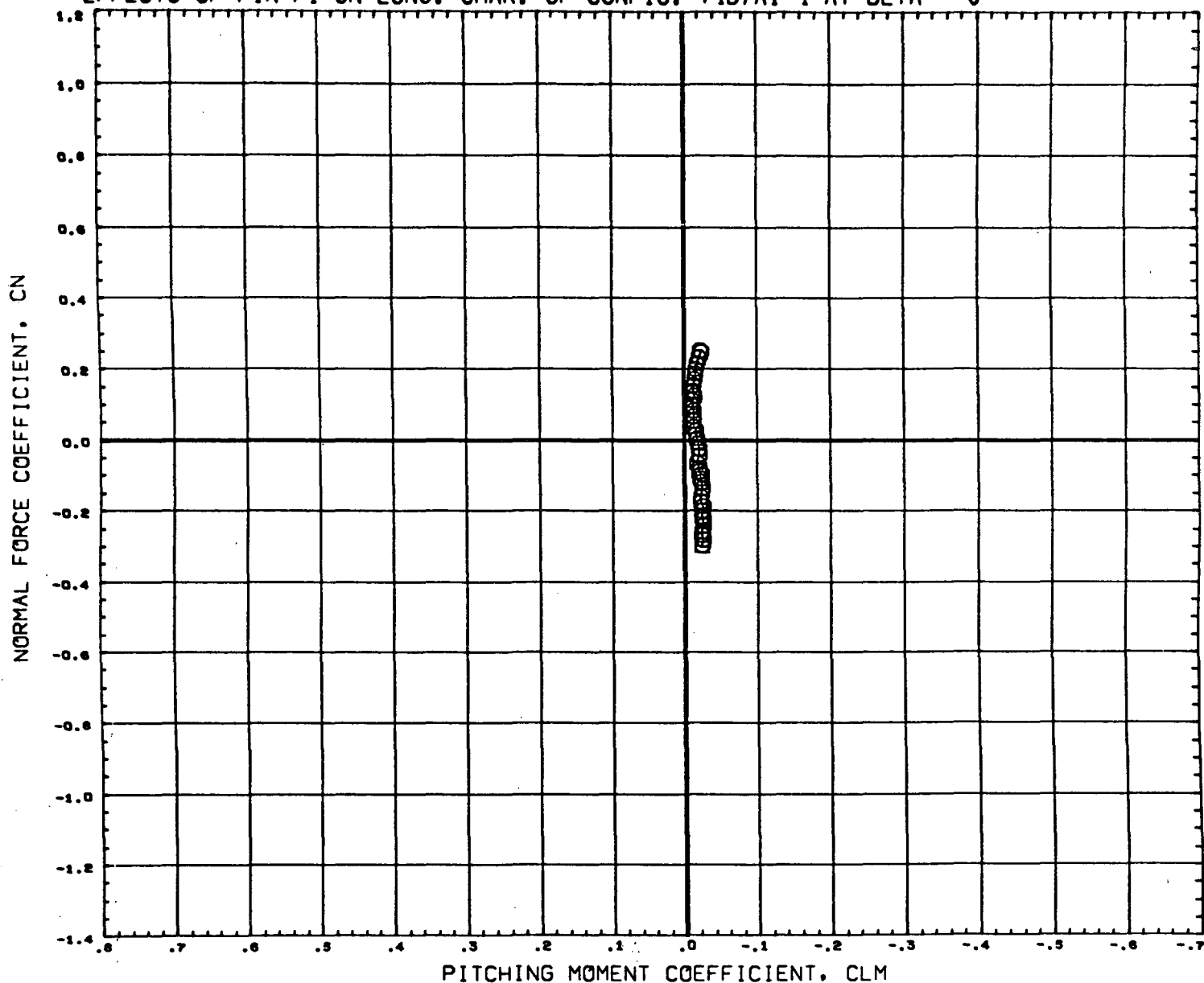
BETA
 0.000
 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH 2.20

PAGE 371

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) MDAC S-222 COMPOSITE (T-CG) T4B7A1-4
 (CD7590) DATA NOT AVAILABLE FOR ALL CONDITIONS

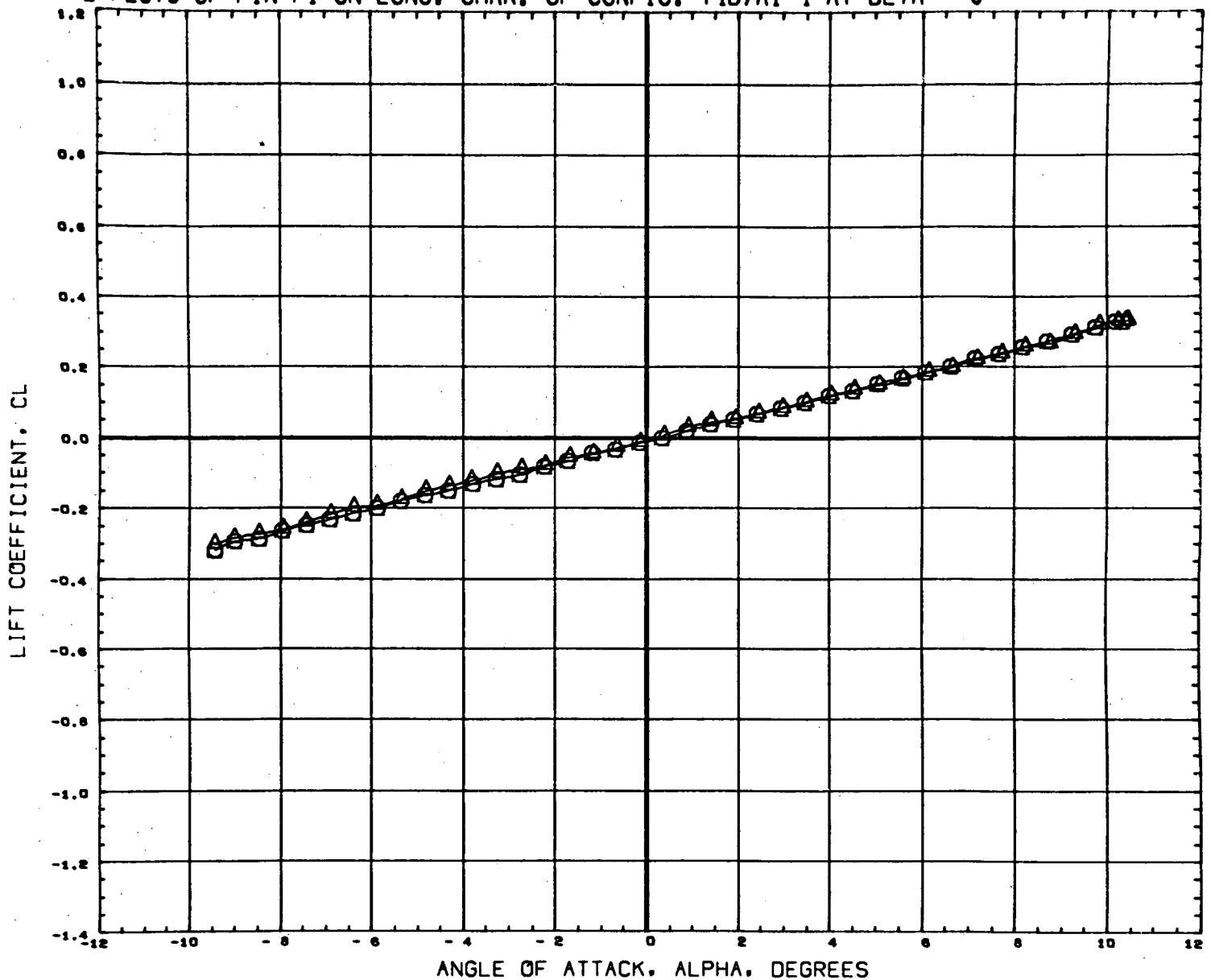
BETA
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 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ. FT.
 LREF 609.5004 IN.
 BREF 862.0004 IN.
 XMRP 957.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH 4.47

PAGE 372

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---------------------------------------|
| (CD7588) | MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (CD7590) | MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4 |

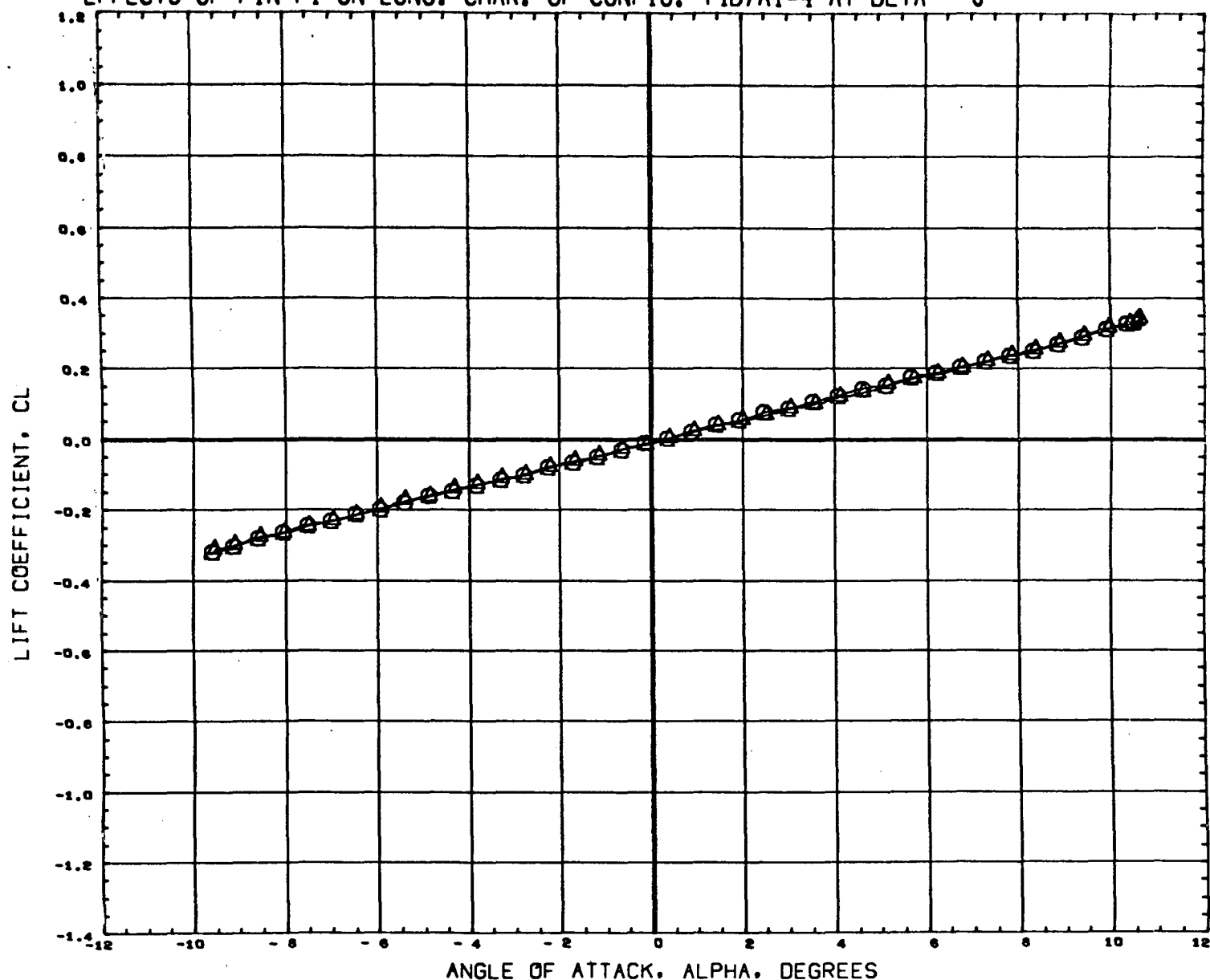
| BETA |
|-------|
| 0.000 |
| 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | 80.FT. |
| LREF | 609.5004 | IN. |
| BREF | 662.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH .58

PAGE 373

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



| DATA SET | SYMBOL | CONFIGURATION DESCRIPTION |
|----------|--------|---------------------------------------|
| (CD7588) | ○ | MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (CD7590) | △ | MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4 |

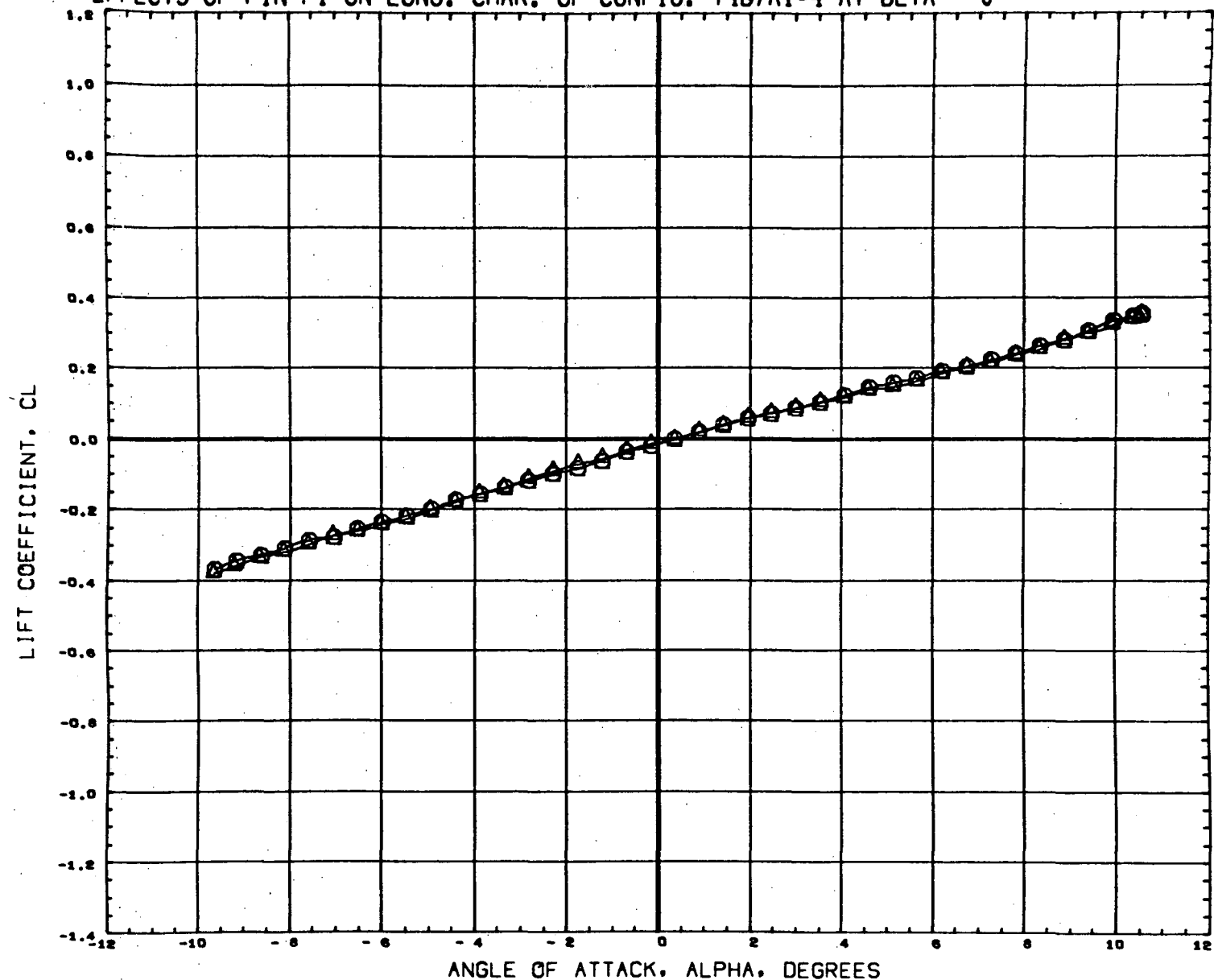
| BETA |
|-------|
| 0.000 |
| 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH .90

PAGE 374

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---------------------------------------|
| (CD7588) | MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (CD7590) | MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4 |

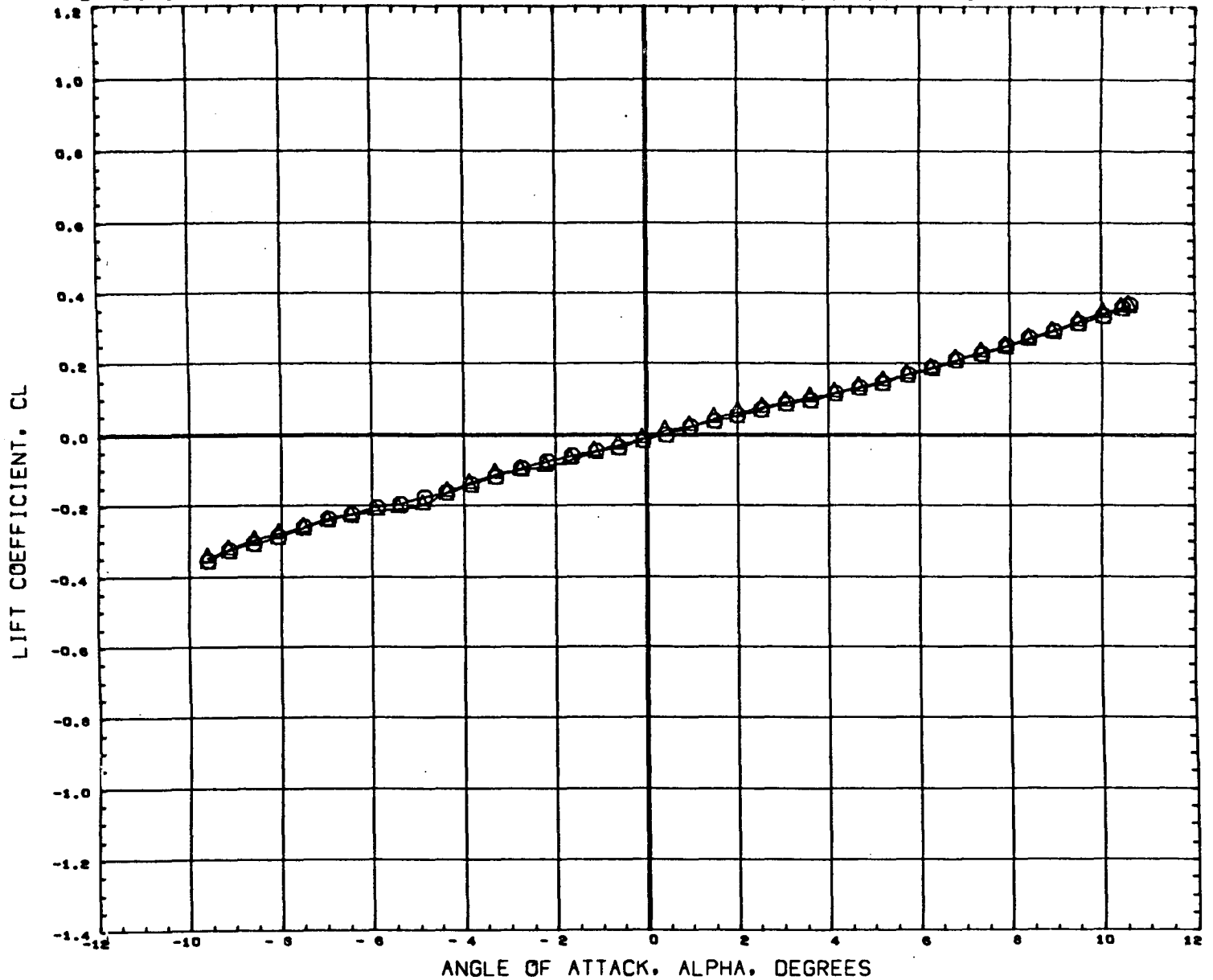
| BETA |
|-------|
| 0.000 |
| 0.000 |



| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH 1.09

PAGE 375

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|--|---------------------------------------|
| (CD7588)  | MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (CD7590)  | MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4 |

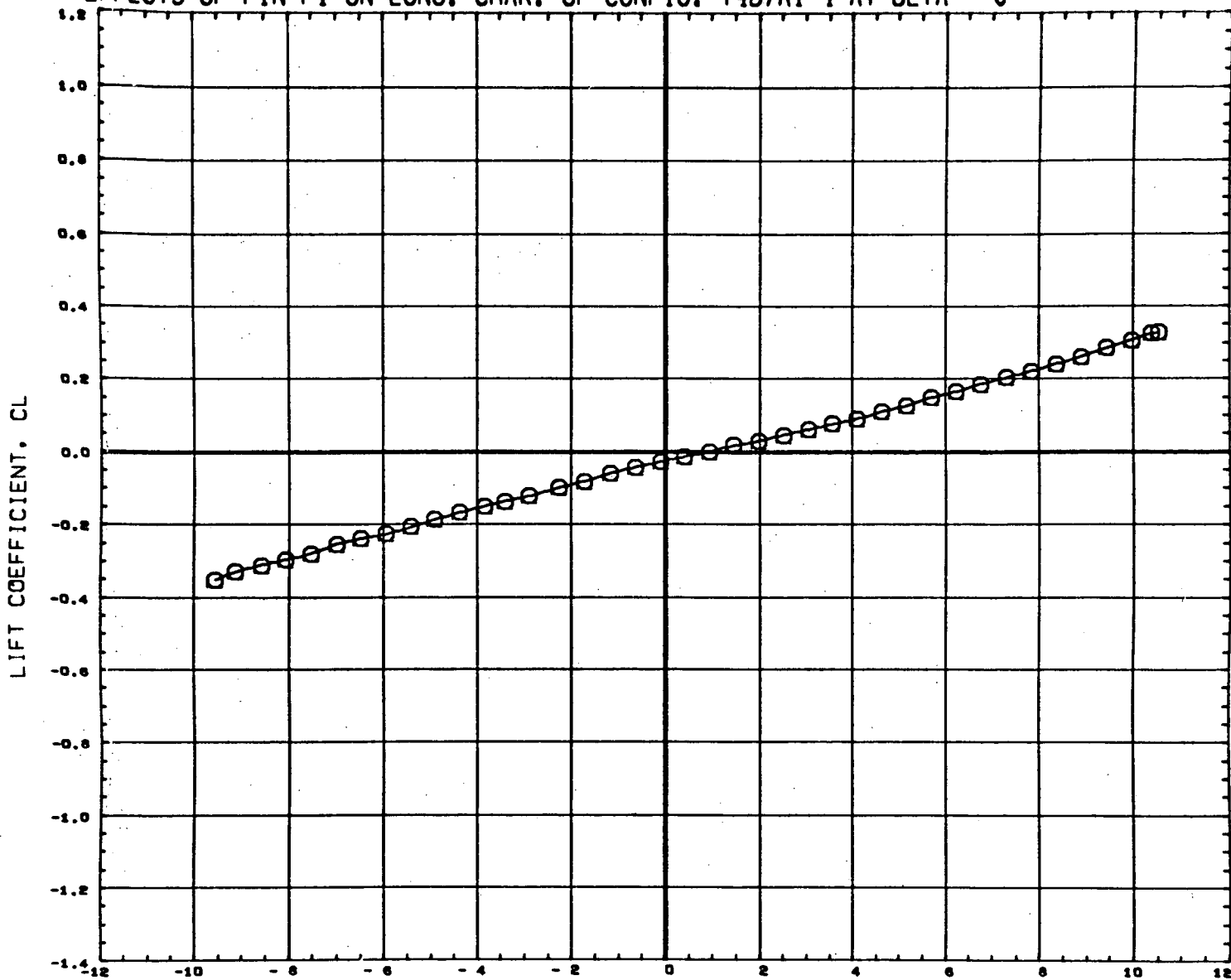
BETA
0.000
0.000

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 682.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH 1.51

PAGE 376

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588)  MDAC S-222 COMPOSITE (T-CG) T4B7A1-4
 (CD7590)  DATA NOT AVAILABLE FOR ALL CONDITIONS

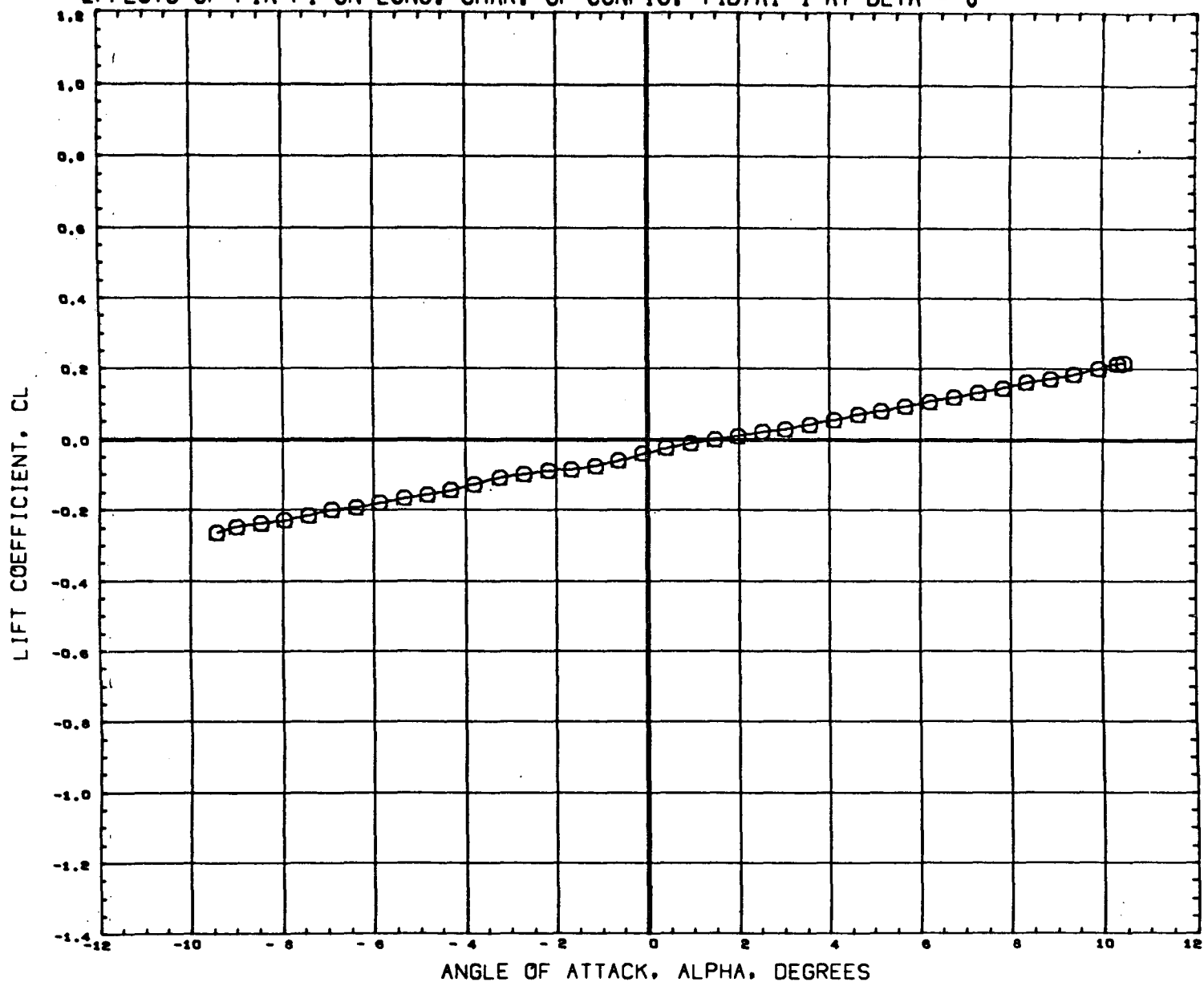
BETA
 0.000
 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH 2.20

PAGE 377

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
 (CD7590) DATA NOT AVAILABLE FOR ALL CONDITIONS

BETA
 0.000
 0.000

REFERENCE INFORMATION

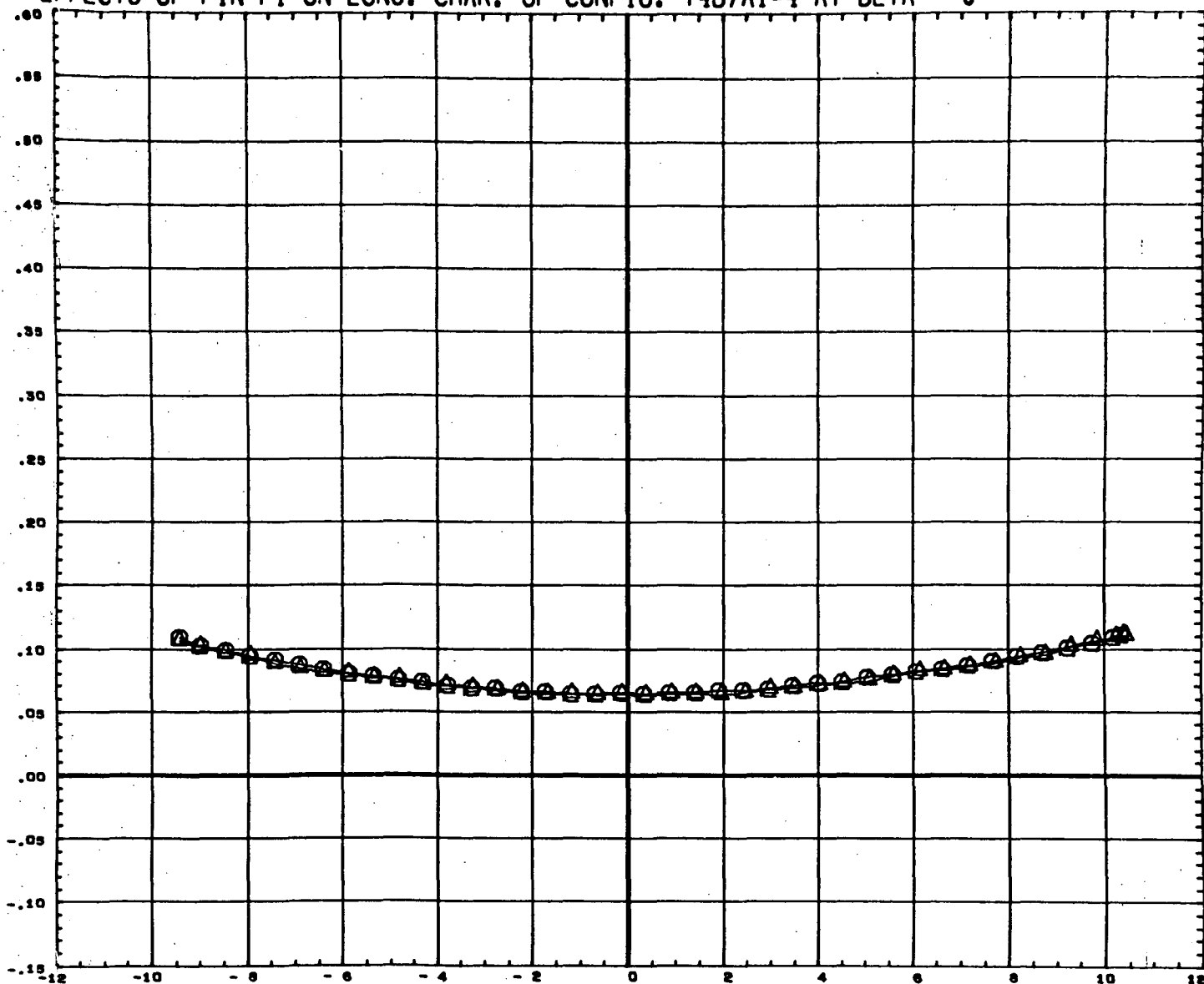
| | | |
|-------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH 4.47

PAGE 378

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) Q MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
 (CD7590) Δ MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4

BETA
 0.000
 0.000

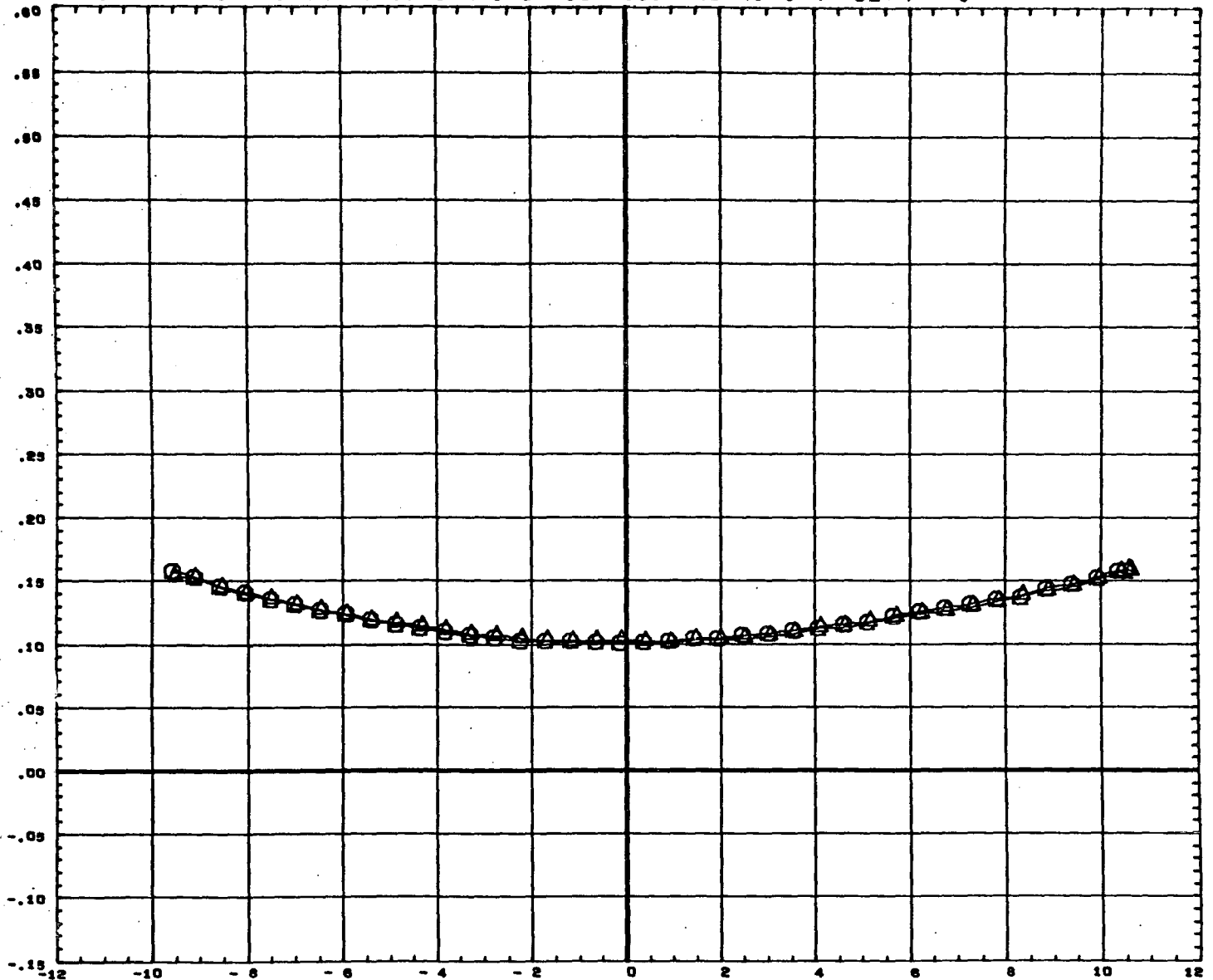
REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH .58

PAGE 379

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



| DATA SET | SYMBOL | CONFIGURATION DESCRIPTION |
|----------|--------|--|
| (CD7588) | ○ | NDAC S-222 COMPOSITE (T-CG) T4B7A1-4 |
| (CD7590) | △ | NDAC S-222 COMPOSITE (T-CG) T4F1B7A1-4 |

| BETA |
|-------|
| 0.000 |
| 0.000 |

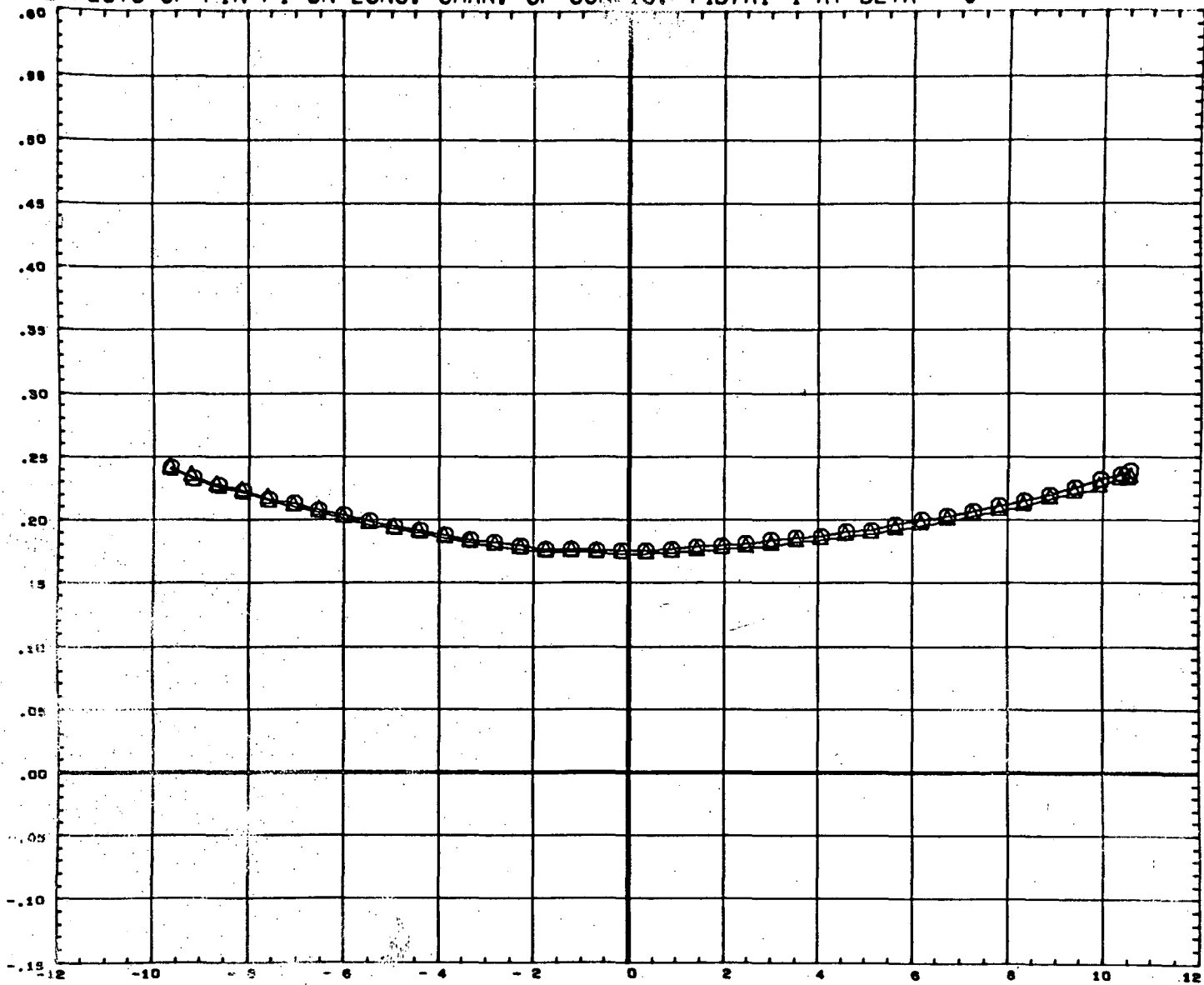
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | sq.ft. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH .90

PAGE 380

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD7588) | Q MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (CD7590) | A MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4 |

| BETA |
|-------|
| 0.000 |
| 0.000 |

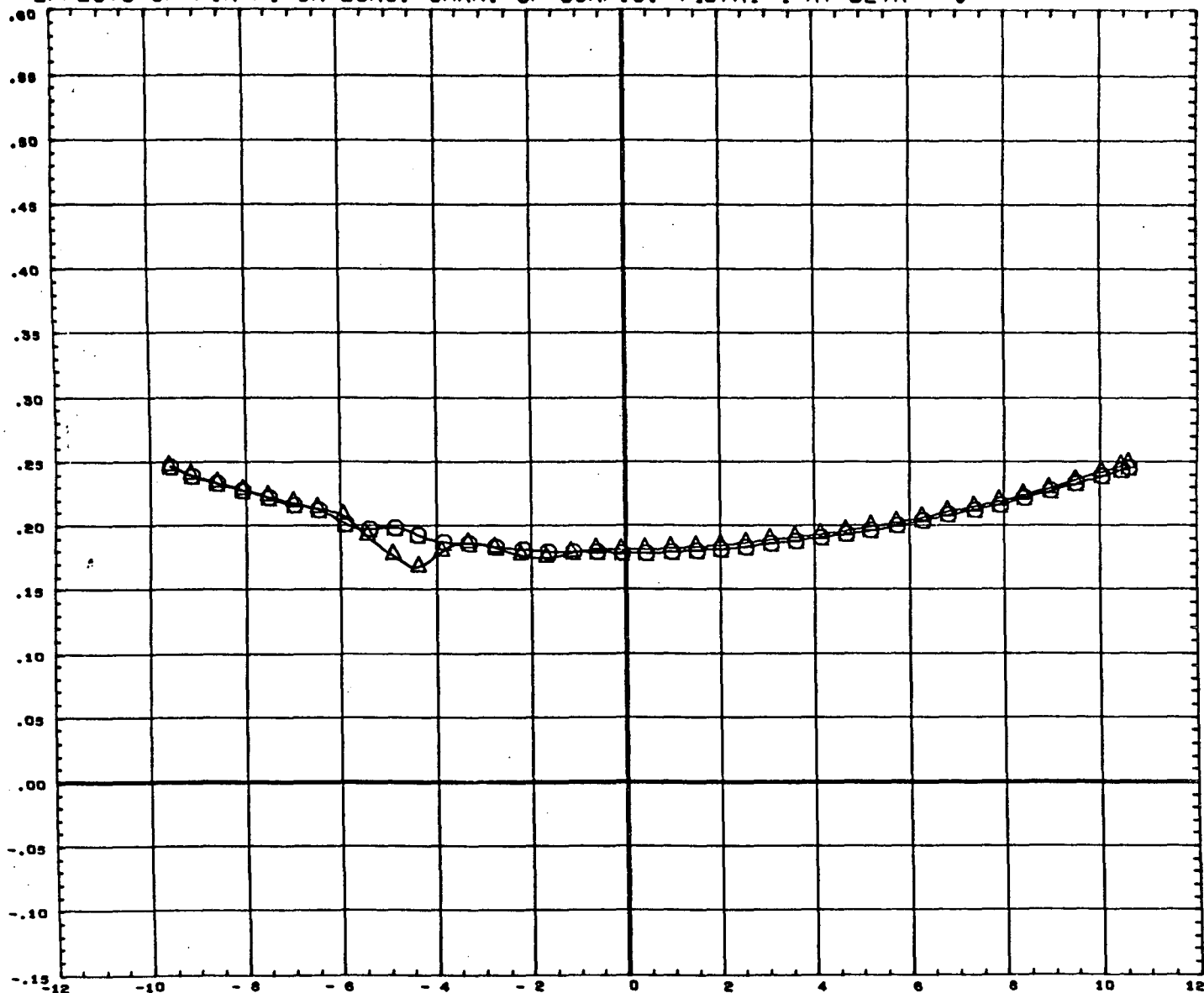
| REFERENCE INFORMATION | |
|-----------------------|------------------|
| SREF | 3155.3040 SQ.FT. |
| LREF | 609.5004 IN. |
| BREF | 682.0004 IN. |
| XMRP | 557.0004 IN. |
| YMRP | 0.0000 IN. |
| ZMRP | 200.0004 IN. |
| SCALE | 0.0060 |

MACH 1.09

PAGE 381

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7988) MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
 (CD7990) MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4

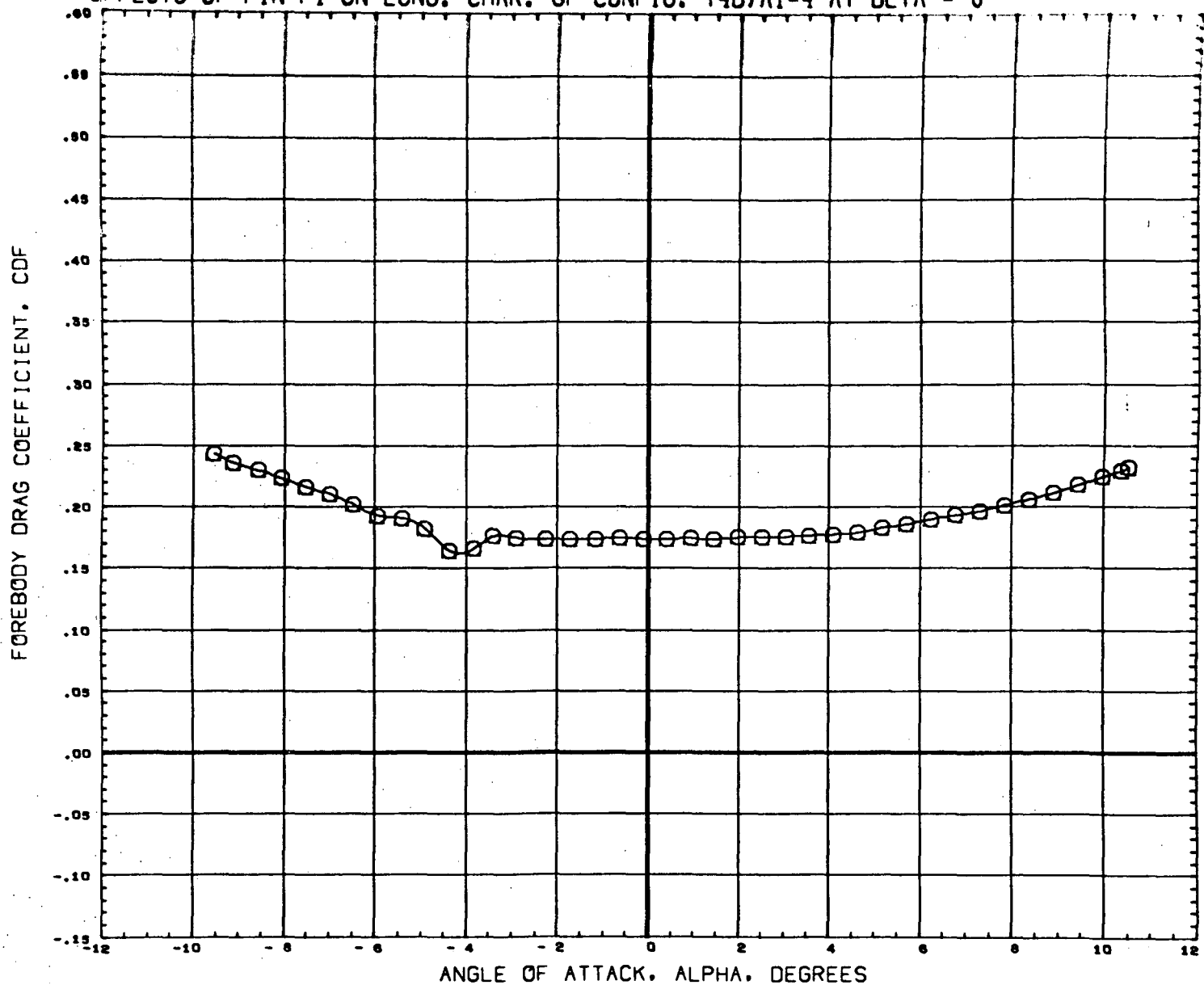
BETA
 0.000
 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ. FT.
 LREF 609.5004 IN.
 BREF 862.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH 1.51

PAGE 382

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) HDAC S-222 COMPOSITE (T-CG) T4B7A1-4
 (CD7590) DATA NOT AVAILABLE FOR ALL CONDITIONS

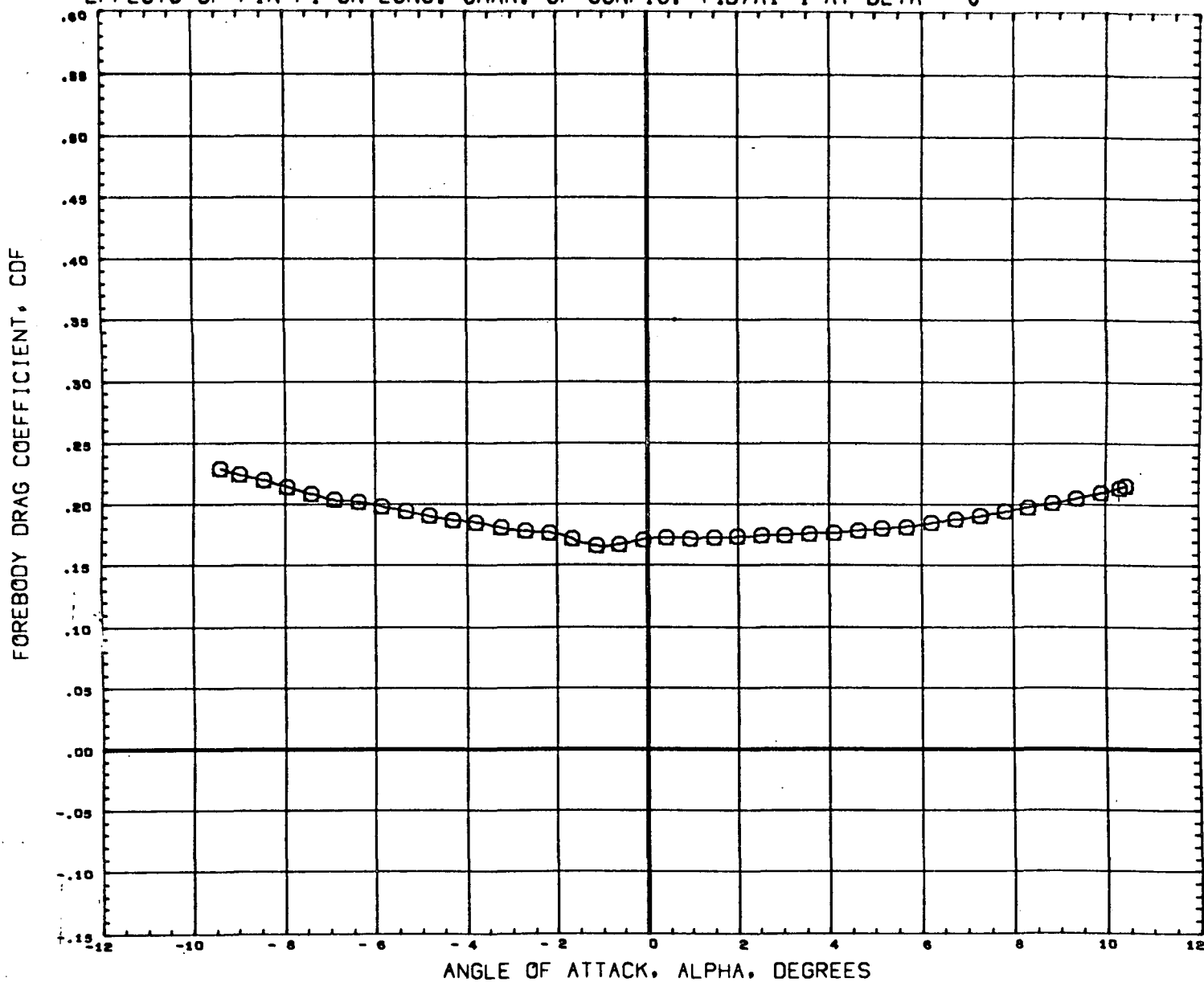
BETA
 0.000
 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH 2.20

PAGE 383

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) \odot MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
 (CD7590) Δ DATA NOT AVAILABLE FOR ALL CONDITIONS

BETA
 0.000
 0.000

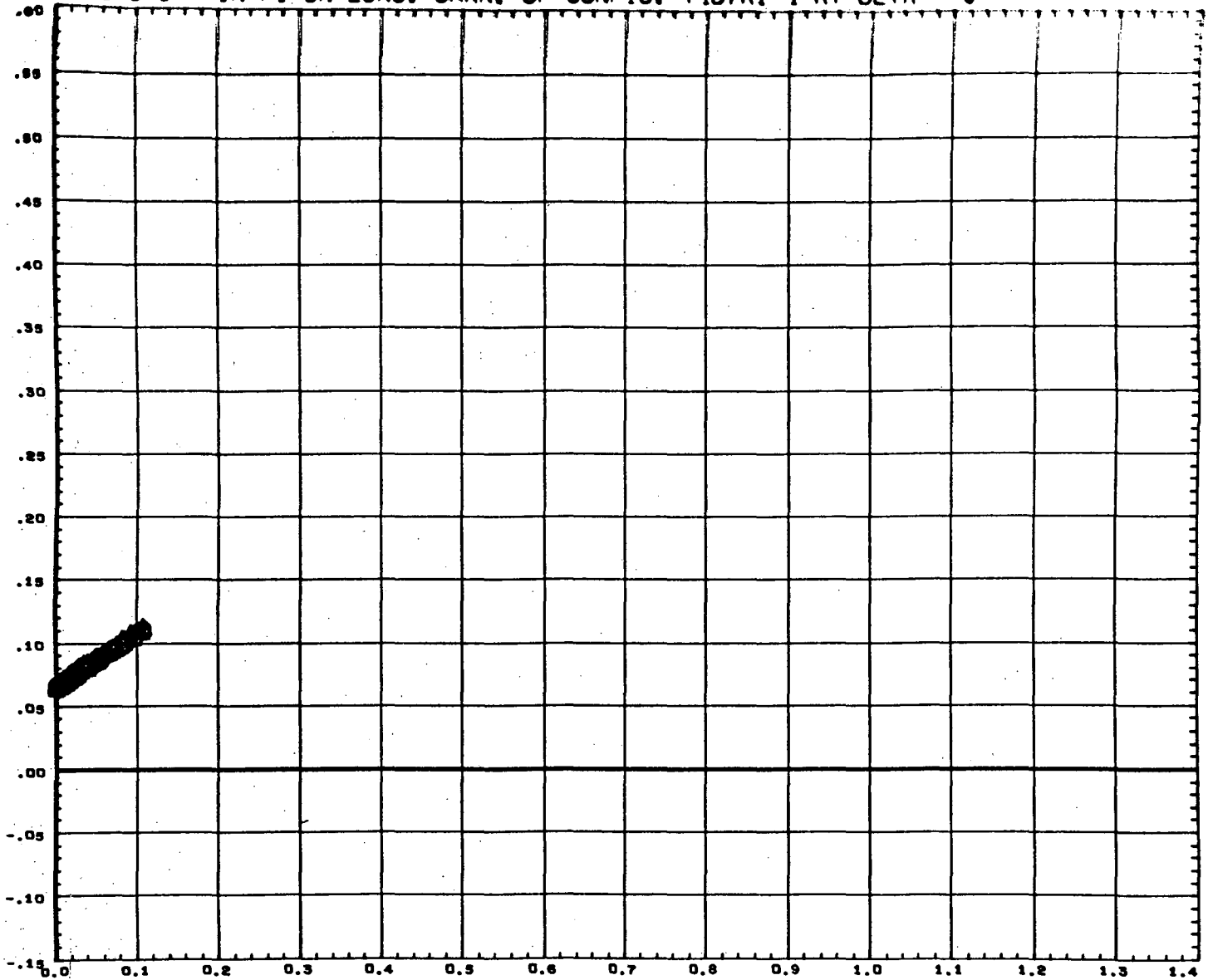
REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 862.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH 4.47

PAGE 384

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) MDAC S-222 COMPOSITE (T-CG) T4B7A1-4
 (CD7590) MDAC S-222 COMPOSITE (T-CG) T4F1B7A1-4

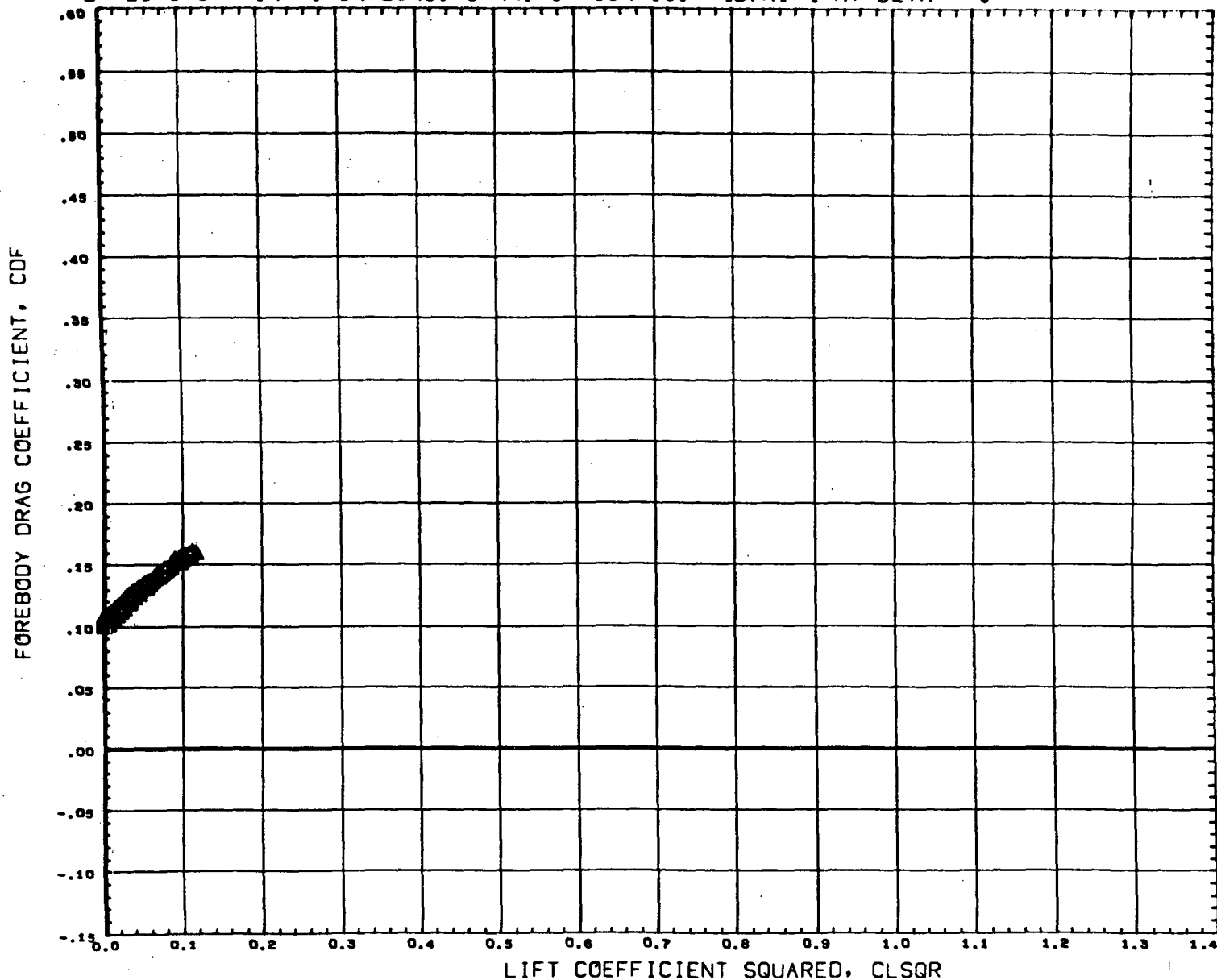
BETA
 0.000
 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ. FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH .58

PAGE 385

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
 (CD7590) MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4

BETA
 0.000
 0.000

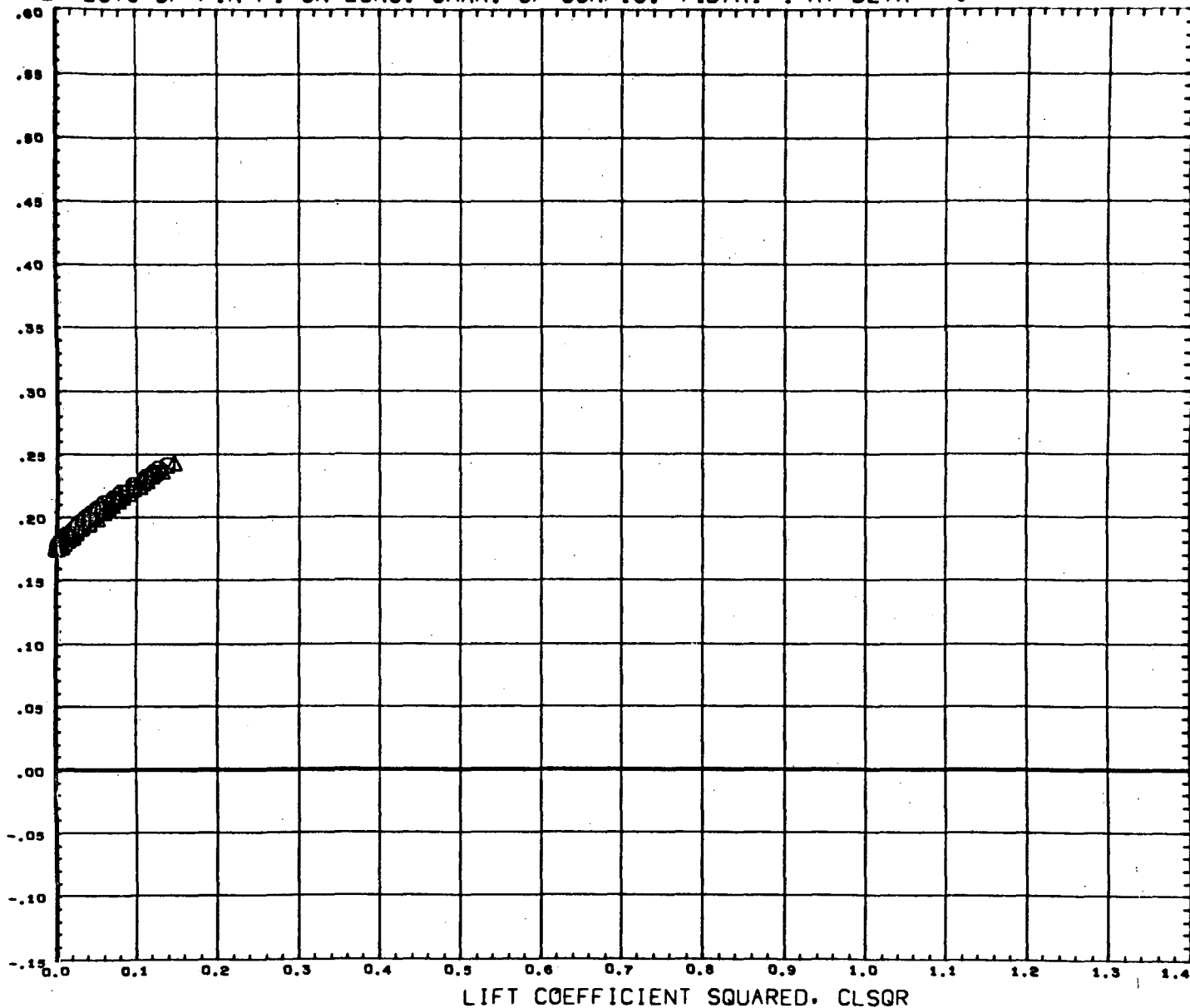
REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 862.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060



MACH .90

PAGE 386

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|--|--|
| (CD7588)  | MDAC S-222 COMPOSITE (T-CG) T4B7A1-4 |
| (CD7590)  | MDAC S-222 COMPOSITE (T-CG) T4F1B7A1-4 |

BETA
0.000
0.000

| REFERENCE INFORMATION | | |
|-----------------------|-----------|---------|
| SREF | 3155.3040 | SQ. FT. |
| LREF | 609.5004 | IN. |
| BREF | 892.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

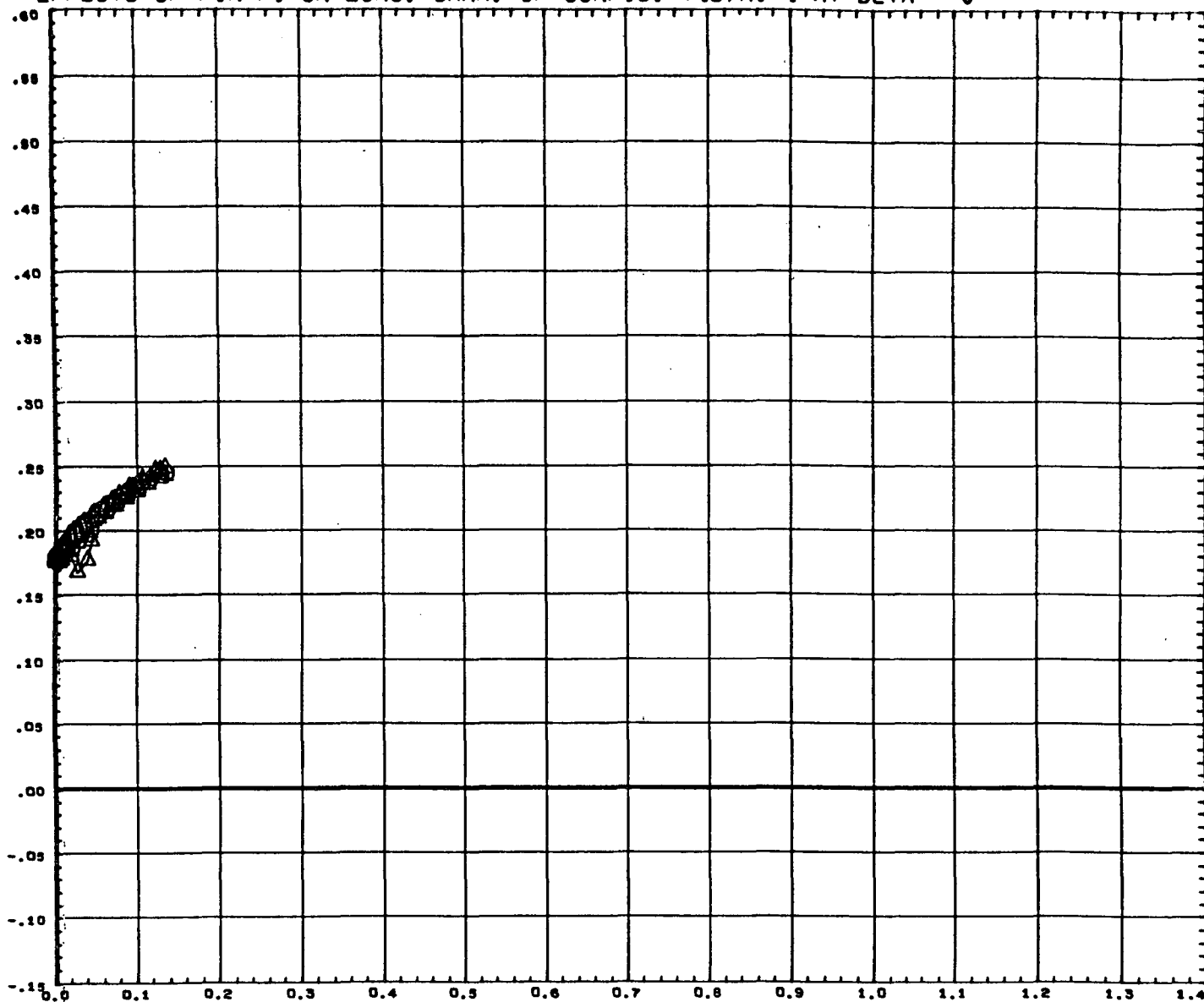
MACH

1.09



PAGE 387

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



LIFT COEFFICIENT SQUARED, CLSQ

| | |
|--|---------------------------------------|
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
| (CD7988)  | MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (CD7990)  | MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4 |

| |
|-------|
| BETA |
| 0.000 |
| 0.000 |

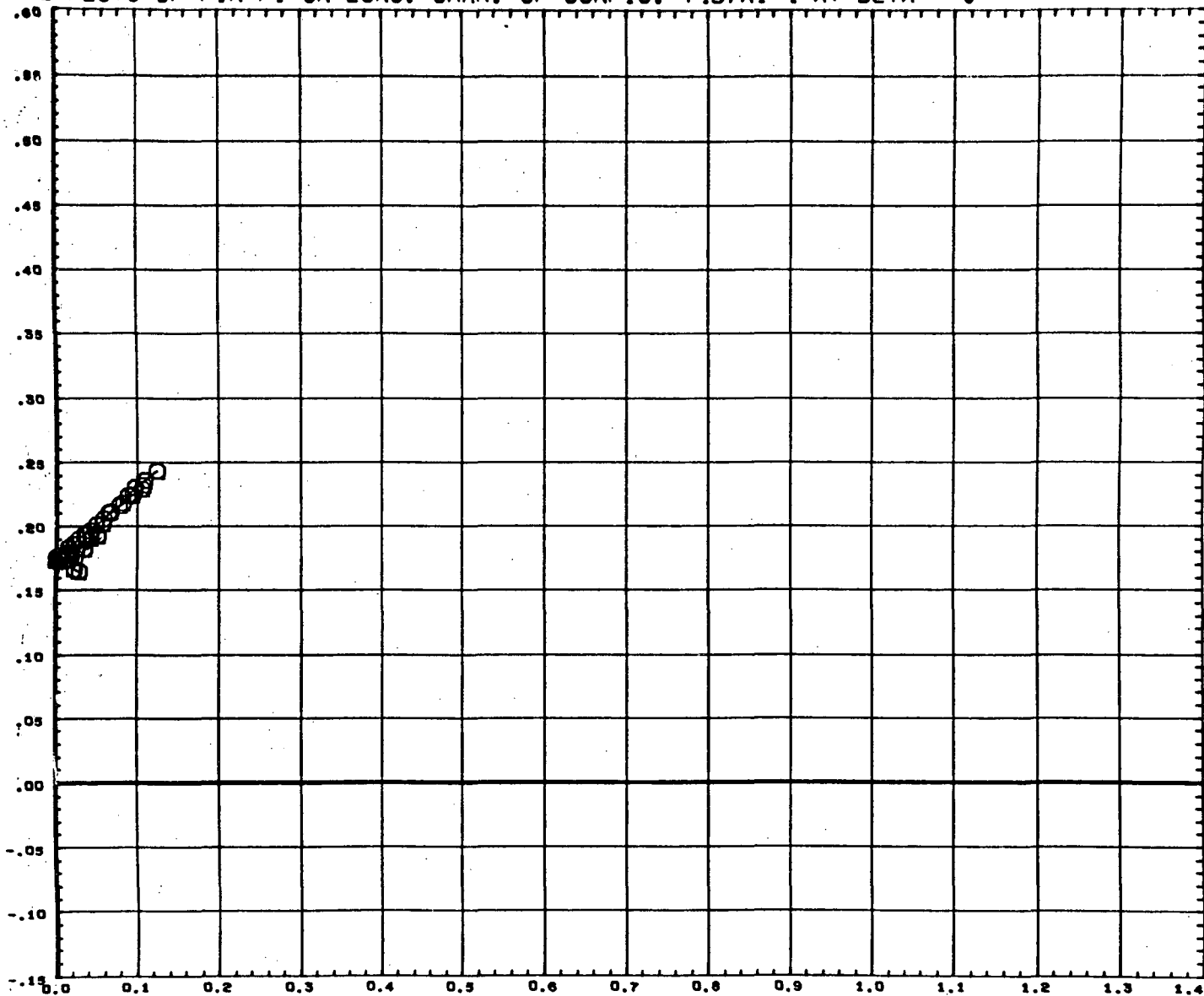
| | | |
|-----------------------|-----------|--------|
| REFERENCE INFORMATION | | |
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.3004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 537.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH 1.51

PAGE 388

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



LIFT COEFFICIENT SQUARED, CLSQR

DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) MDAC S-222 COMPOSITE (T-CG) T4B7A1-4
 (CD7590) DATA NOT AVAILABLE FOR ALL CONDITIONS

BETA
 0.000
 0.000

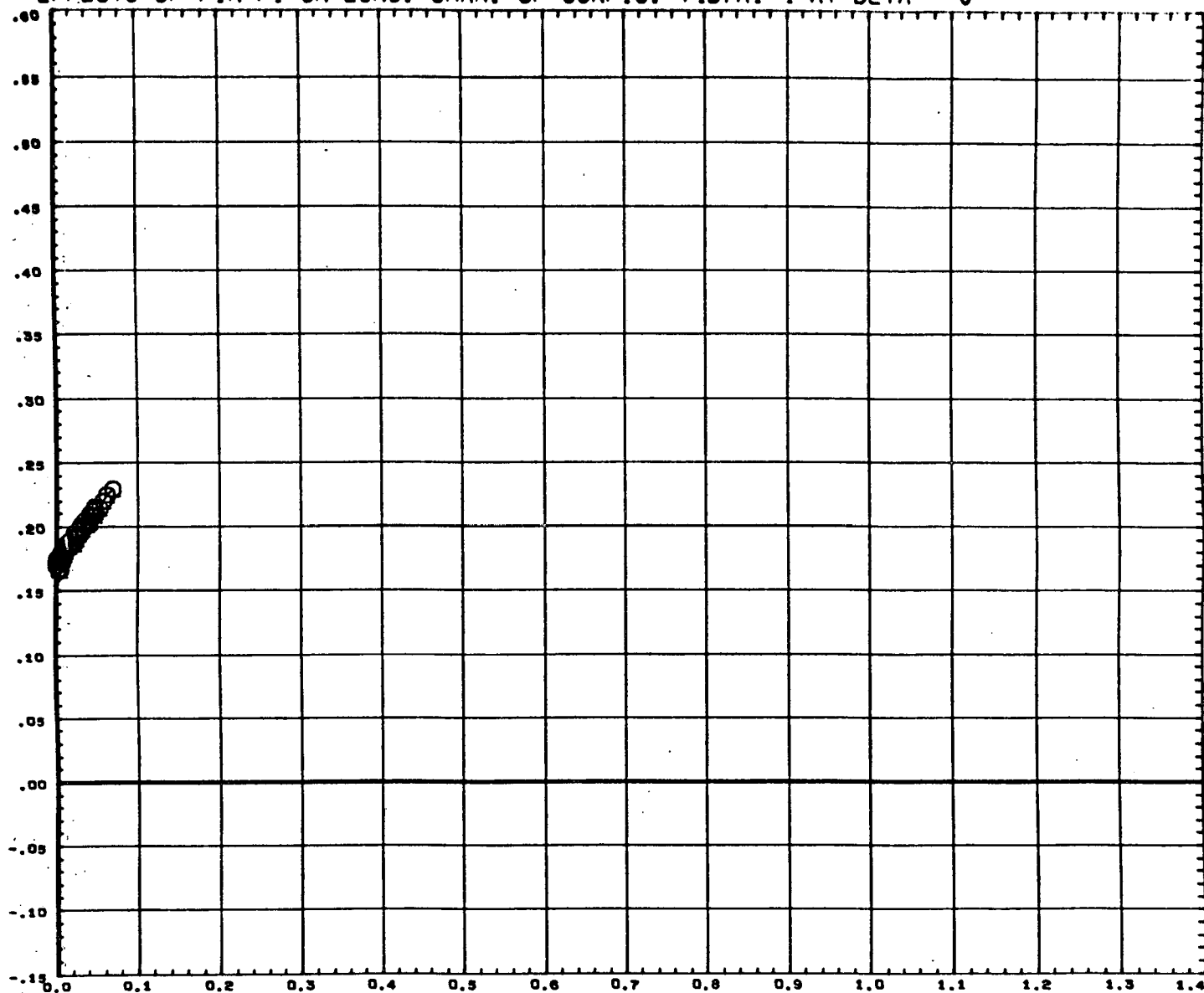
REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 957.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH 2.20

PAGE 389

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (C07588) Q MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
 (C07590) A DATA NOT AVAILABLE FOR ALL CONDITIONS

BETA
 0.000
 0.000

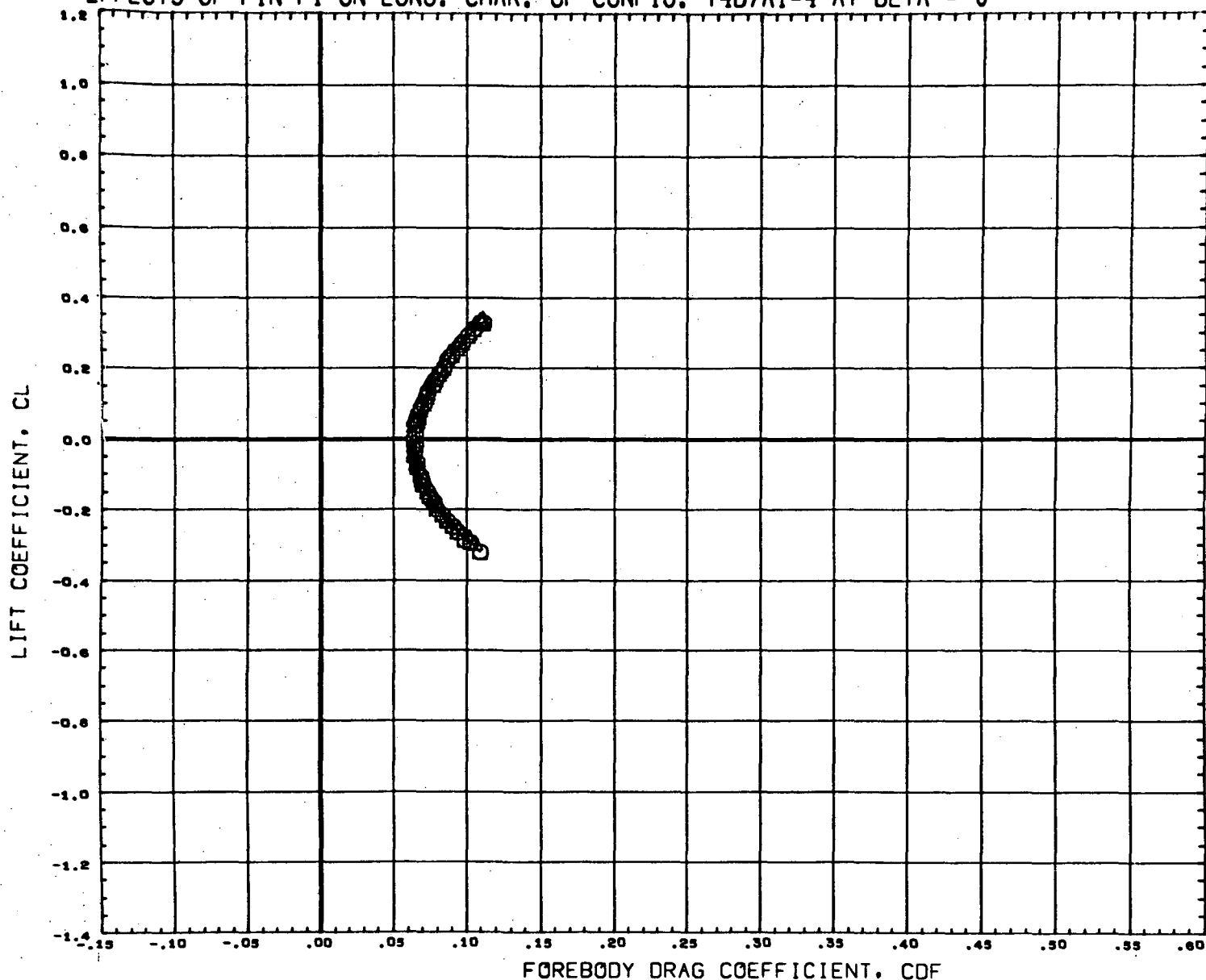
REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH

4.47

PAGE 390

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---------------------------------------|
| (CD7568) | MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (CD7590) | MDAC S-222 COMPOSITE(T-CG) T4F187A1-4 |

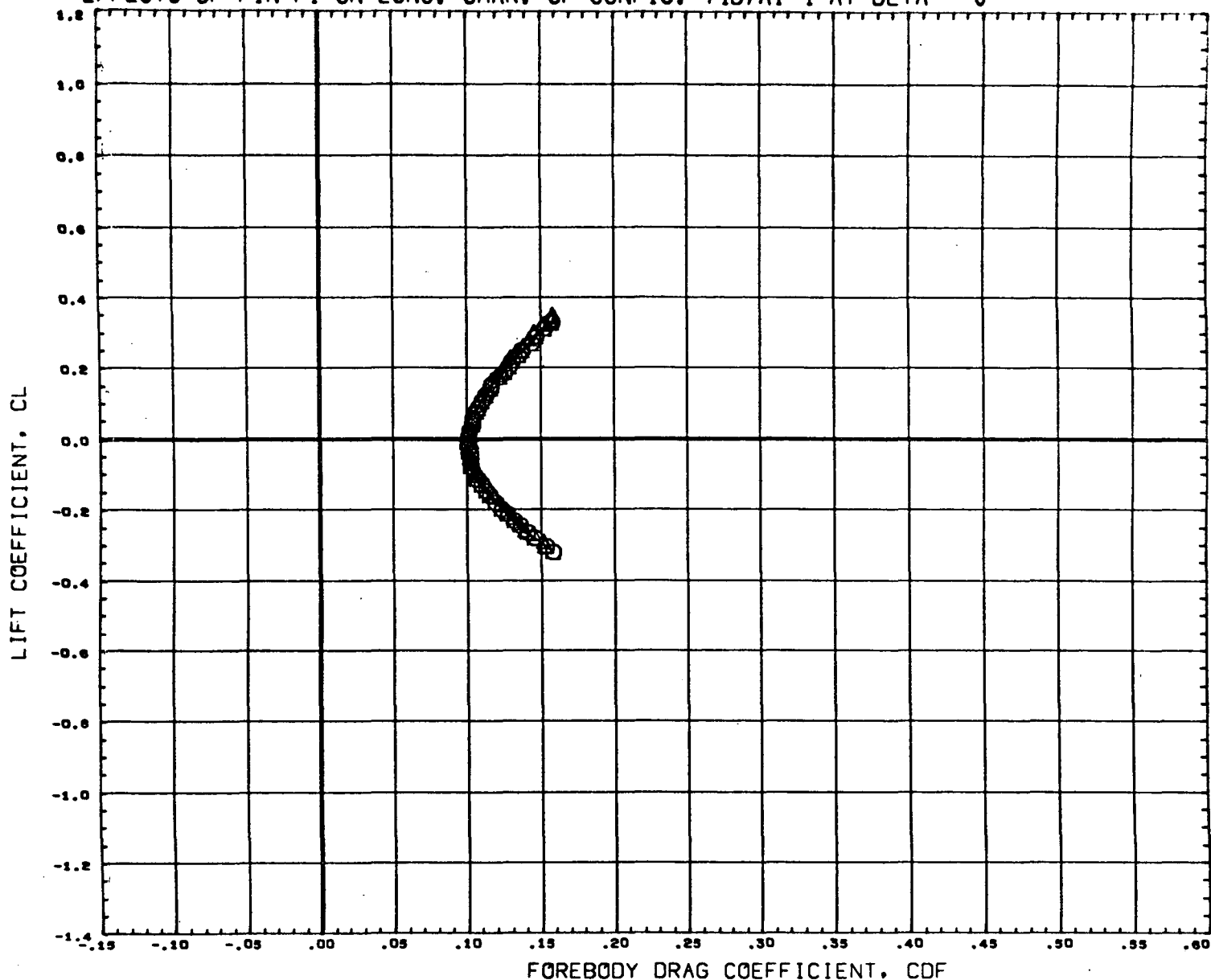
BETA
0.000
0.000

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 662.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH .58

PAGE 391

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
 (CD7590) MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4

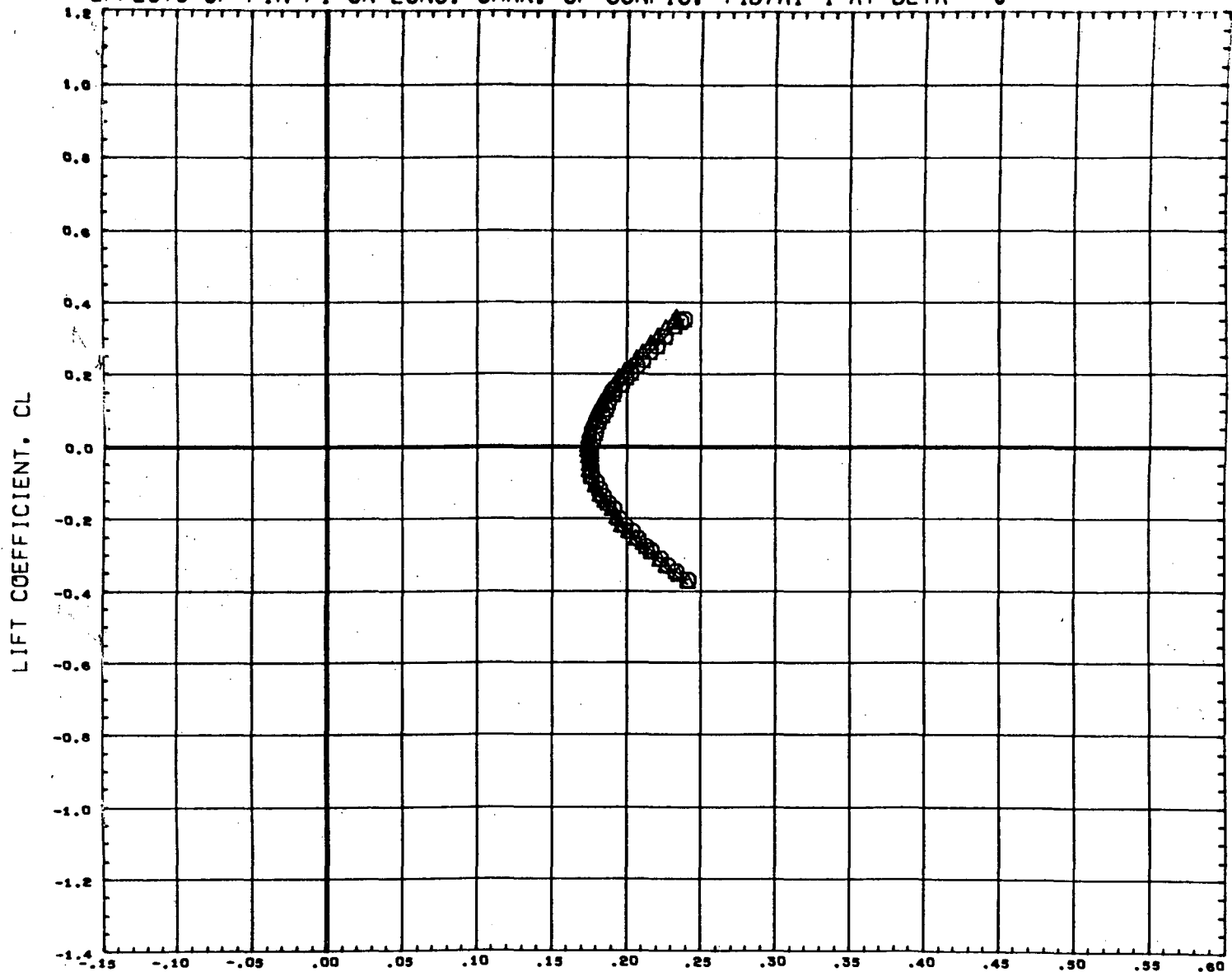
BETA
 0.000
 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 GREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH .90

PAGE 392

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
(CD7588) MDAC S-222 COMPOSITE (T-CG) T4B7A1-4
(CD7590) MDAC S-222 COMPOSITE (T-CG) T4F1B7A1-4

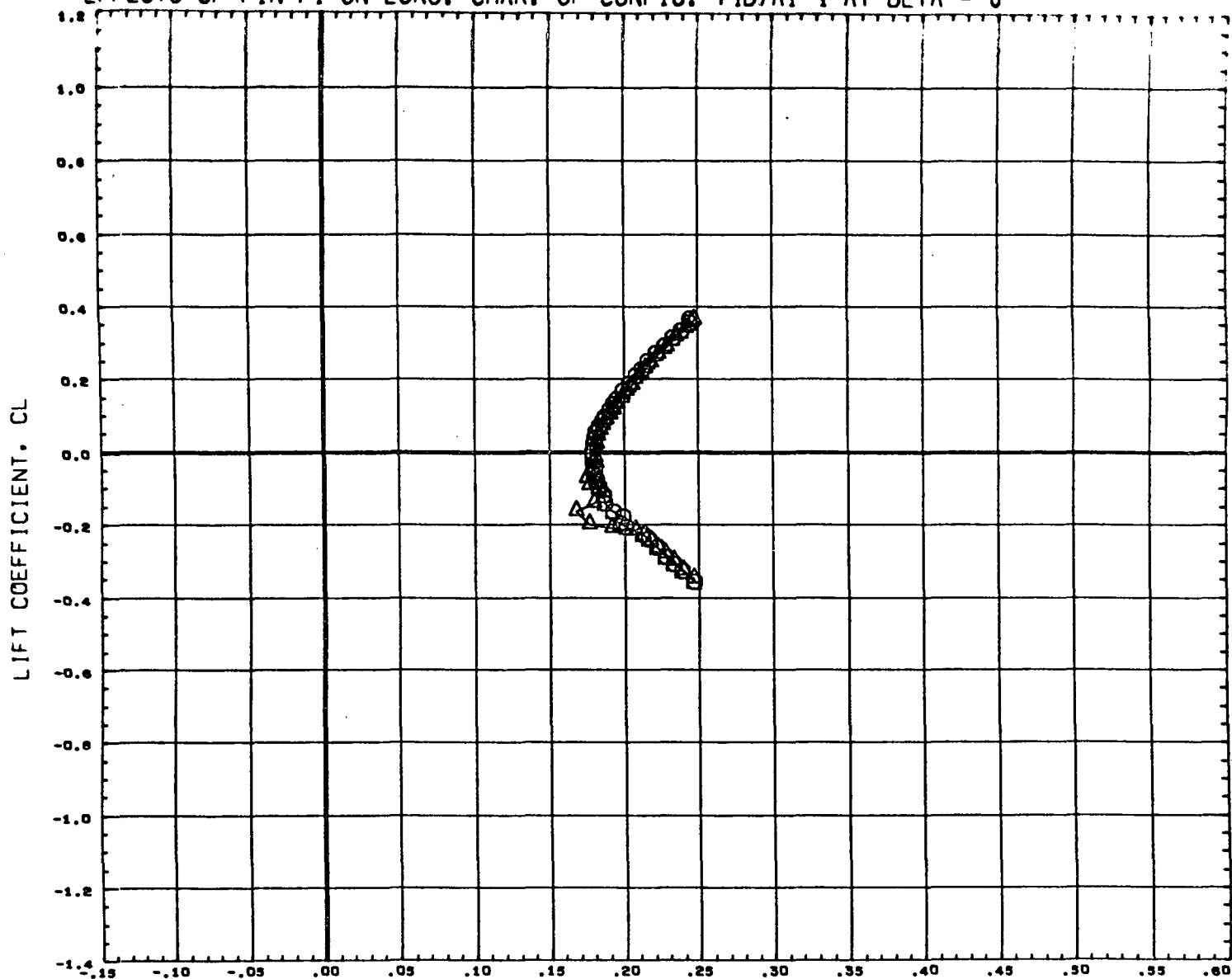
BETA
0.000
0.000

REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 862.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060

MACH 1.09

PAGE 393

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---------------------------------------|
| (CD7588) | MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (CD7590) | MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4 |

| BETA |
|-------|
| 0.000 |
| 0.000 |

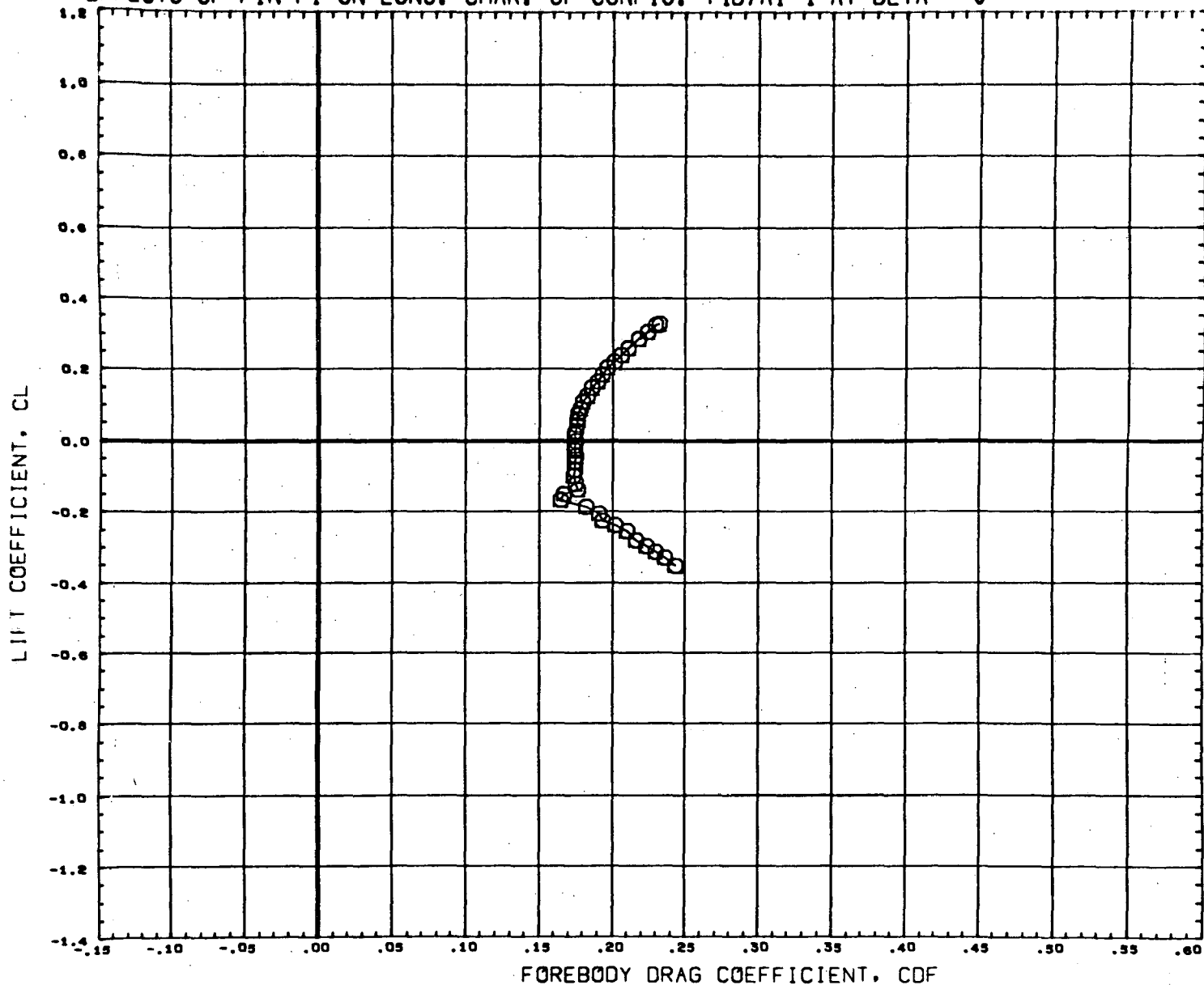
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH

1.51

PAGE 394

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) MDAC S-222 COMPOSITE (T-CG) T4B7A1-4
 (CD7590) DATA NOT AVAILABLE FOR ALL CONDITIONS

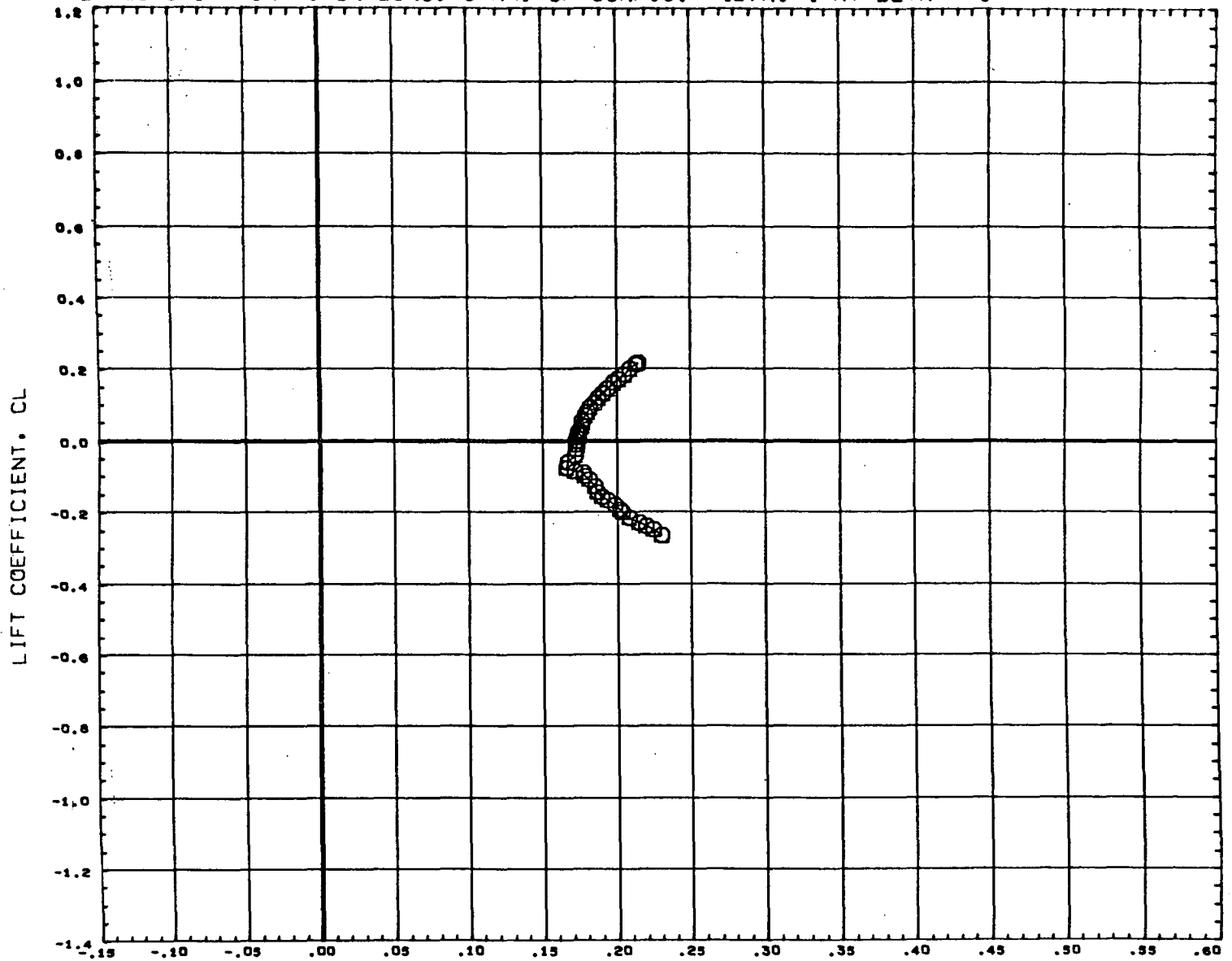
BETA
 0.000
 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 662.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH 2.20

PAGE 395

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
 (CD7590) DATA NOT AVAILABLE FOR ALL CONDITIONS

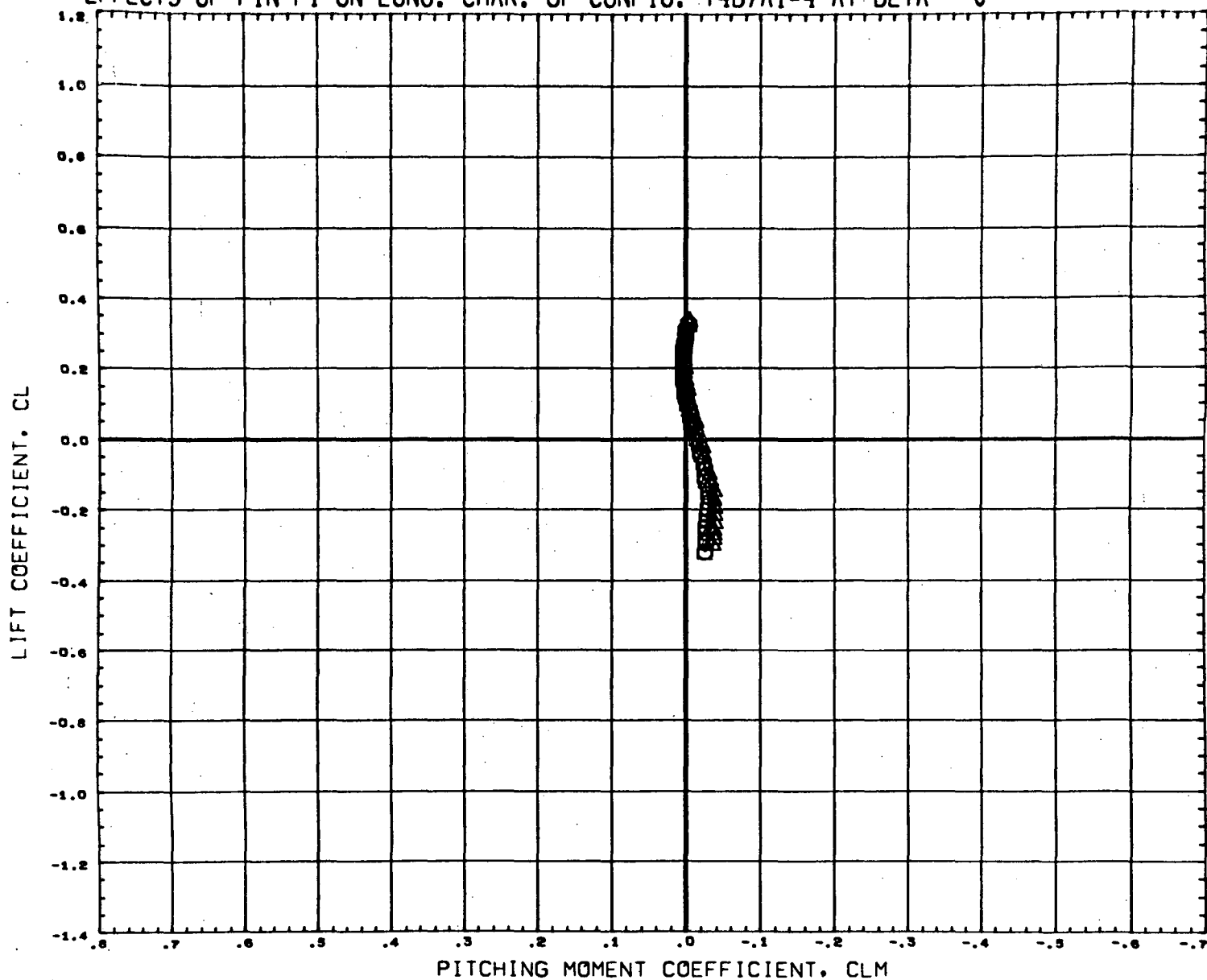
BETA
 0.000
 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.3004 IN.
 BREF 862.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0080

MACH 4.47

PAGE 396

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD7588) | MDAC S-222 COMPOSITE (T-CG) T4B7A1-4 |
| (CD7590) | MDAC S-222 COMPOSITE (T-CG) T4F1B7A1-4 |

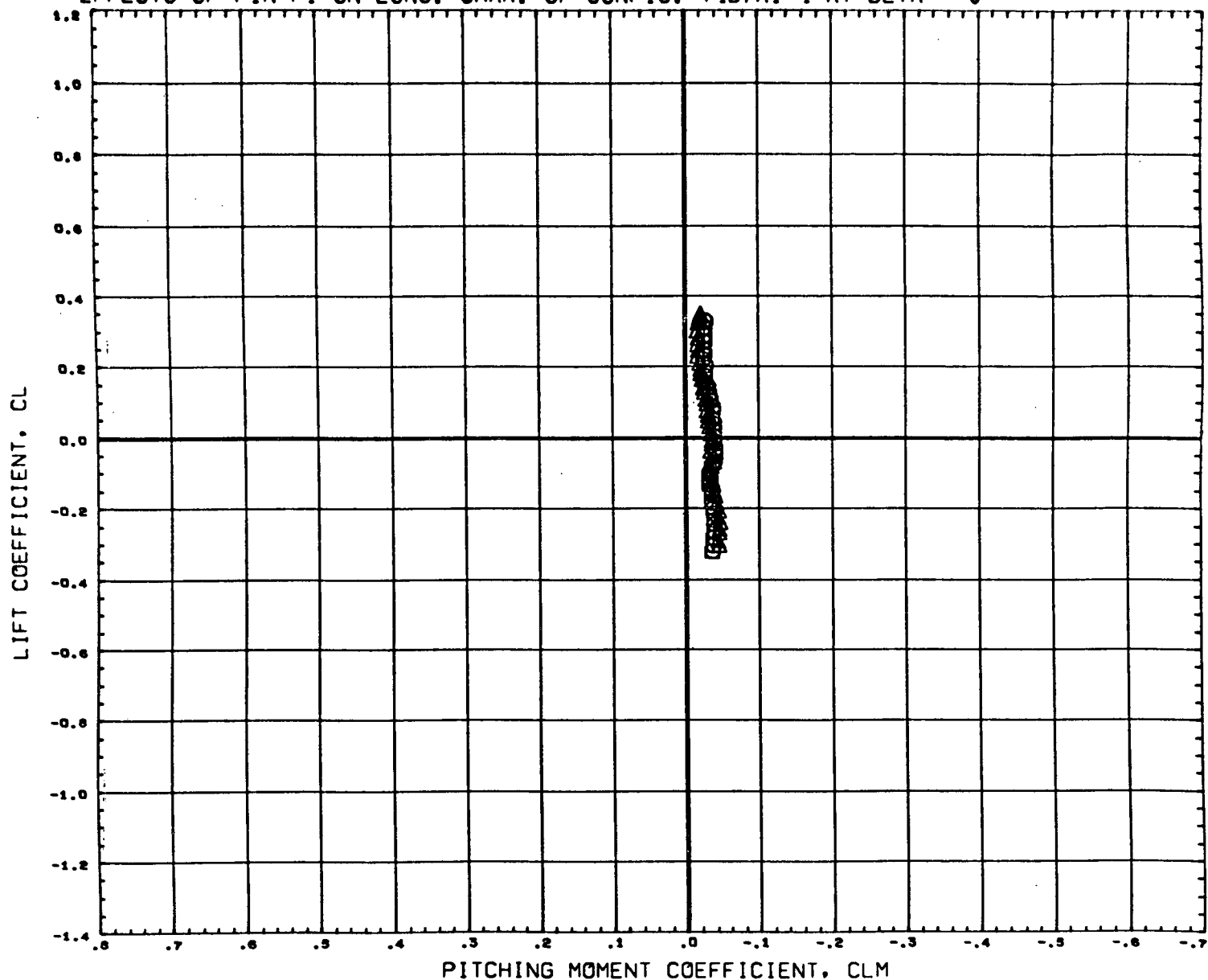
| BETA |
|-------|
| 0.000 |
| 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|---------|
| SREF | 3155.3040 | 50. FT. |
| LREF | 609.5004 | IN. |
| BREF | 682.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH .58

PAGE 397

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) MDAC S-222 COMPOSITE (T-CG) T4B7A1-4
 (CD7590) MDAC S-222 COMPOSITE (T-CG) T4F1B7A1-4

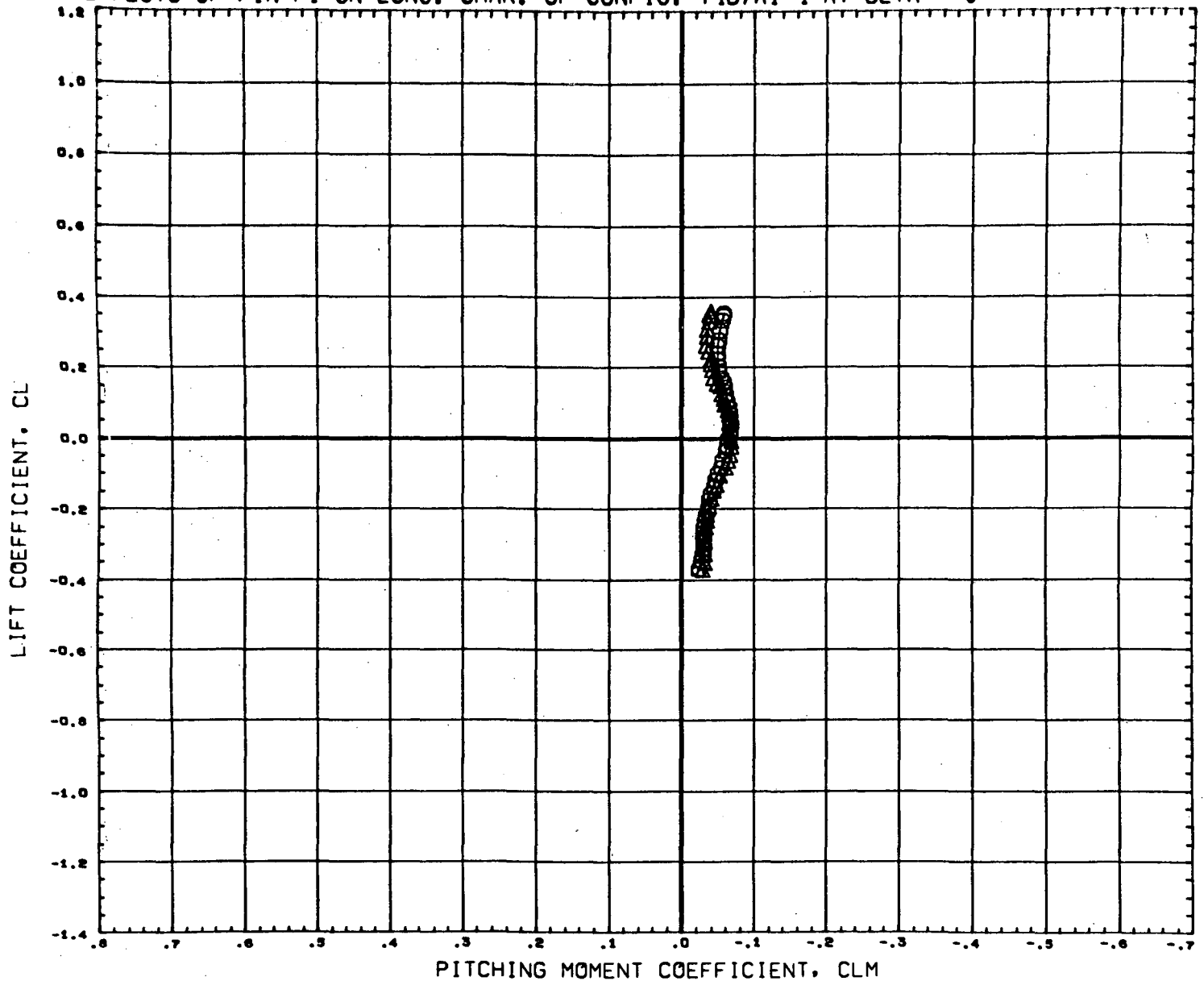
BETA
 0.000
 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH .90

PAGE 398

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD7588) | MDAC S-222 COMPOSITE (T-CG) T4B7A1-4 |
| (CD7590) | MDAC S-222 COMPOSITE (T-CG) T4F1B7A1-4 |

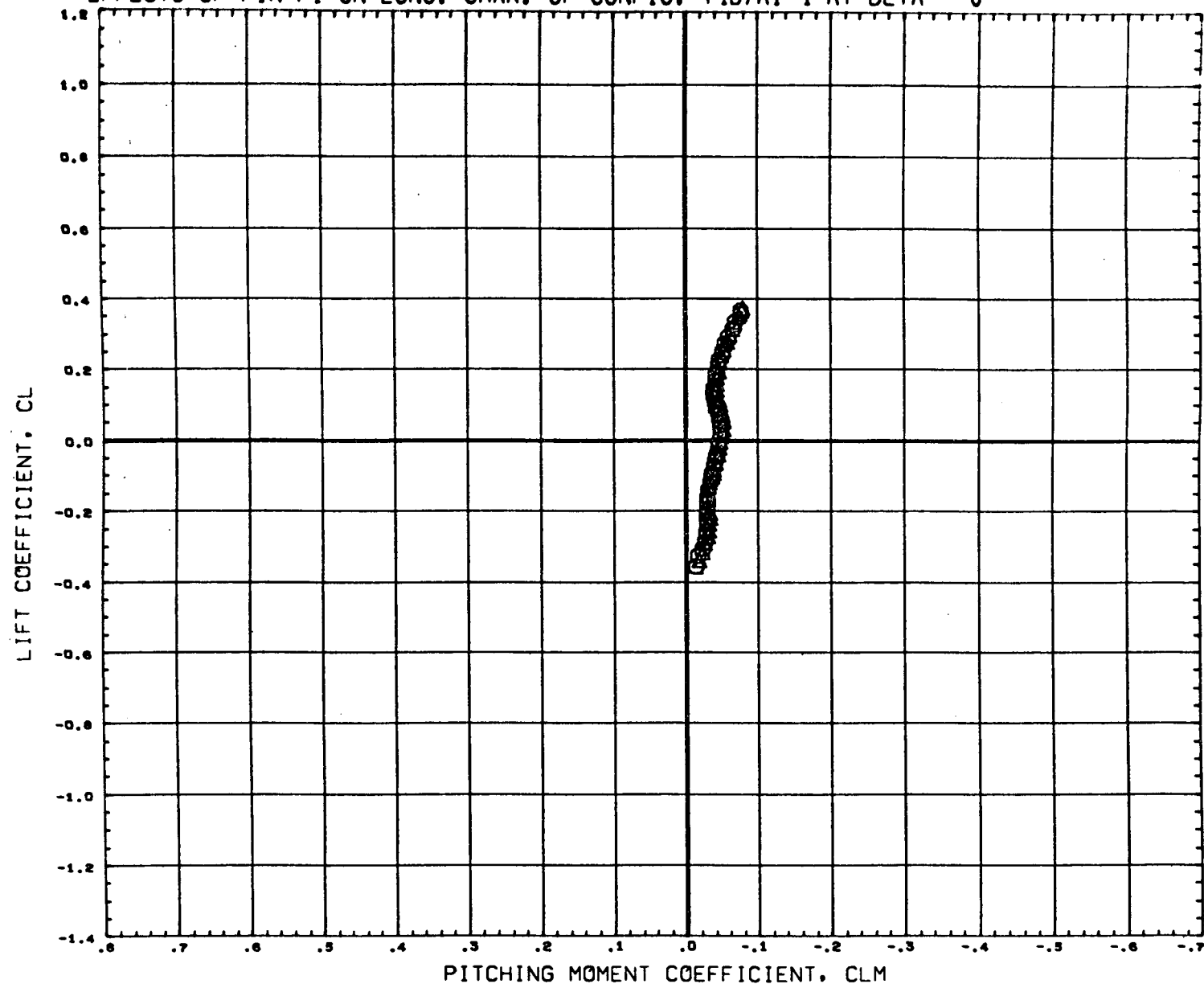
| BETA |
|-------|
| 0.000 |
| 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|---------|
| SREF | 3155.3040 | SQ. FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH 1.09

PAGE 399

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---------------------------------------|
| (C07588) | MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (C07590) | MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4 |

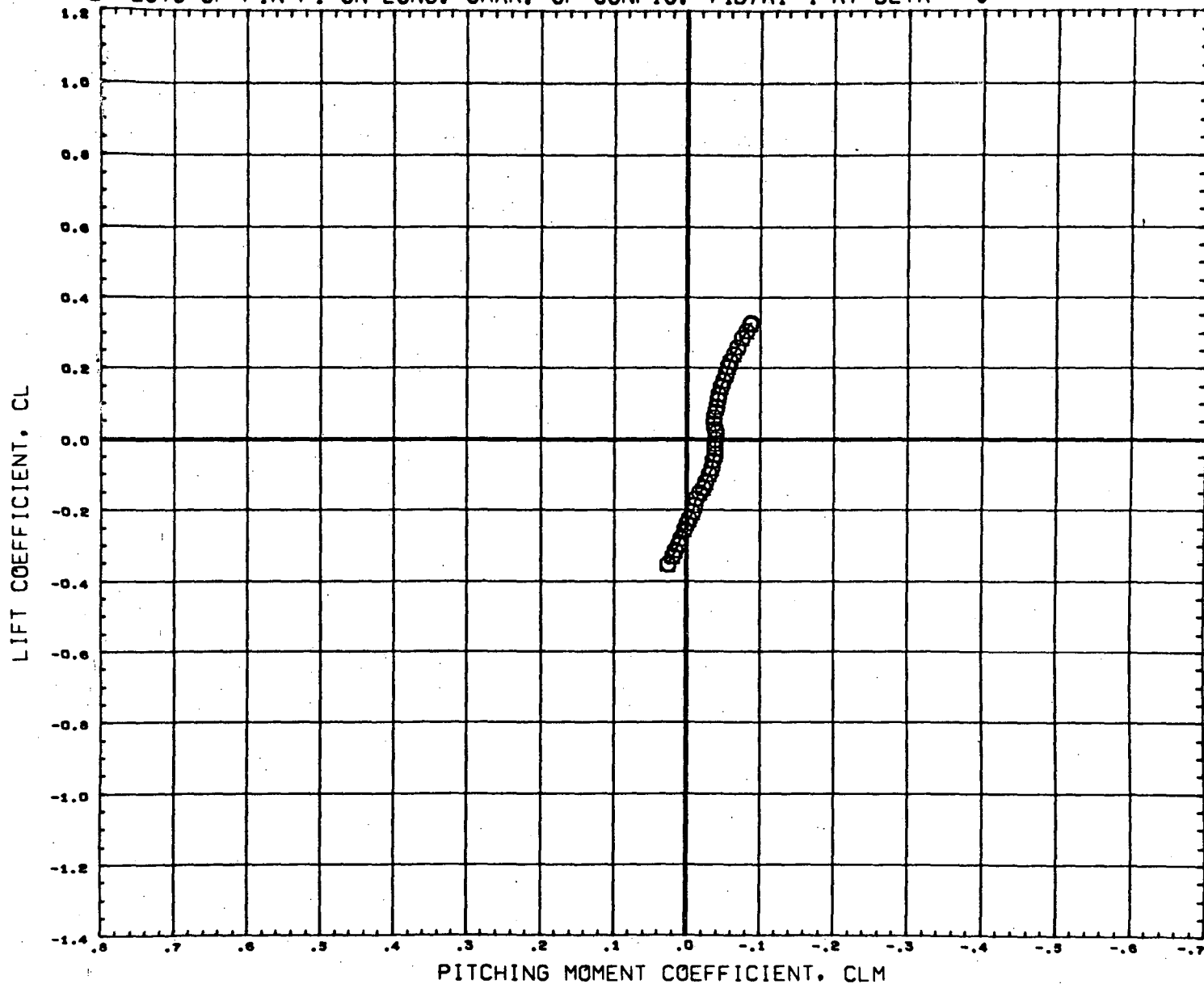
| BETA |
|-------|
| 0.000 |
| 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 537.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH 1.51

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EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD7588) MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
 (CD7590) DATA NOT AVAILABLE FOR ALL CONDITIONS

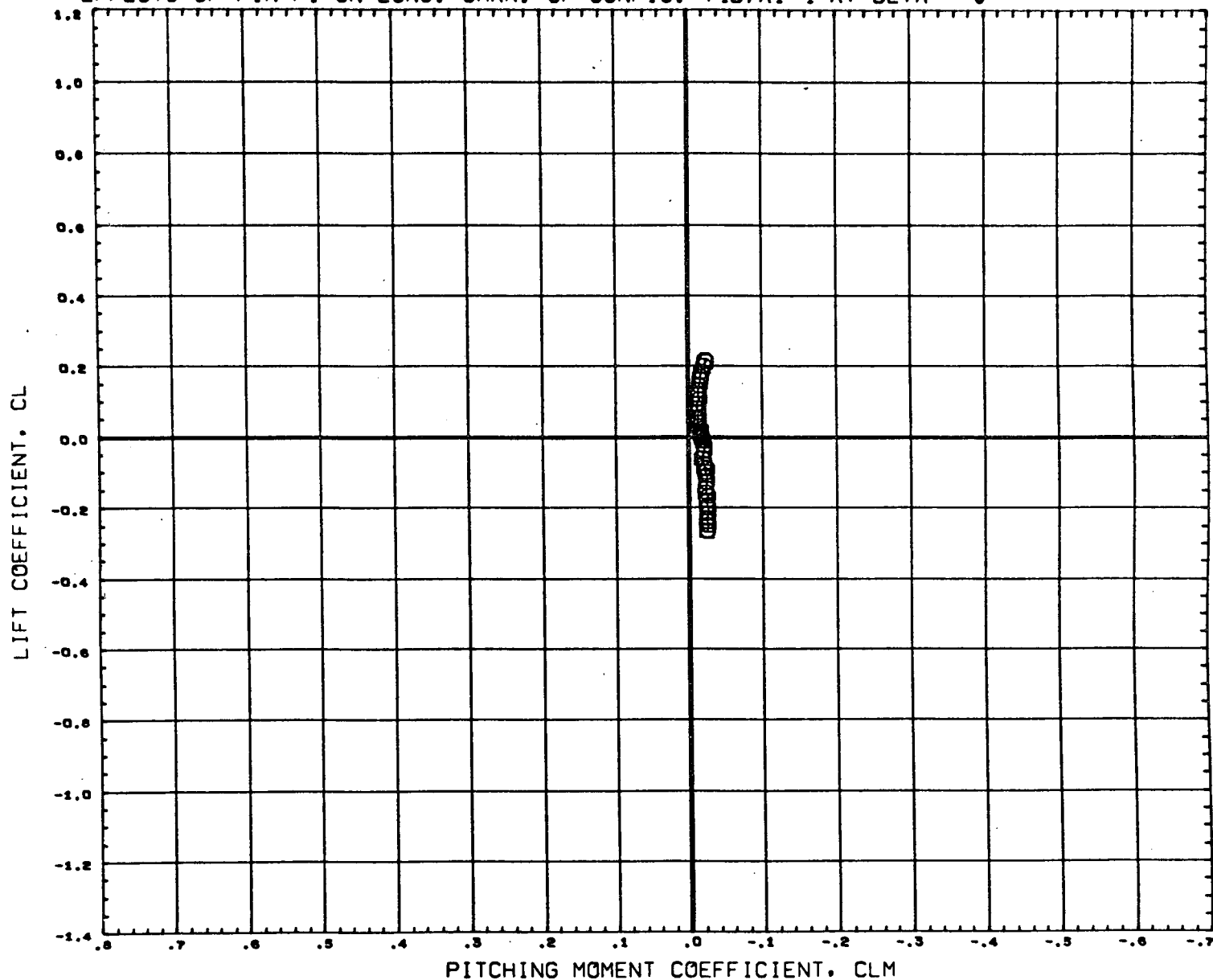
BETA
 0.000
 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.3004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH 2.20

PAGE 401

EFFECTS OF FIN F1 ON LONG. CHAR. OF CONFIG. T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---------------------------------------|
| (CD7588) | MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (CD7590) | DATA NOT AVAILABLE FOR ALL CONDITIONS |

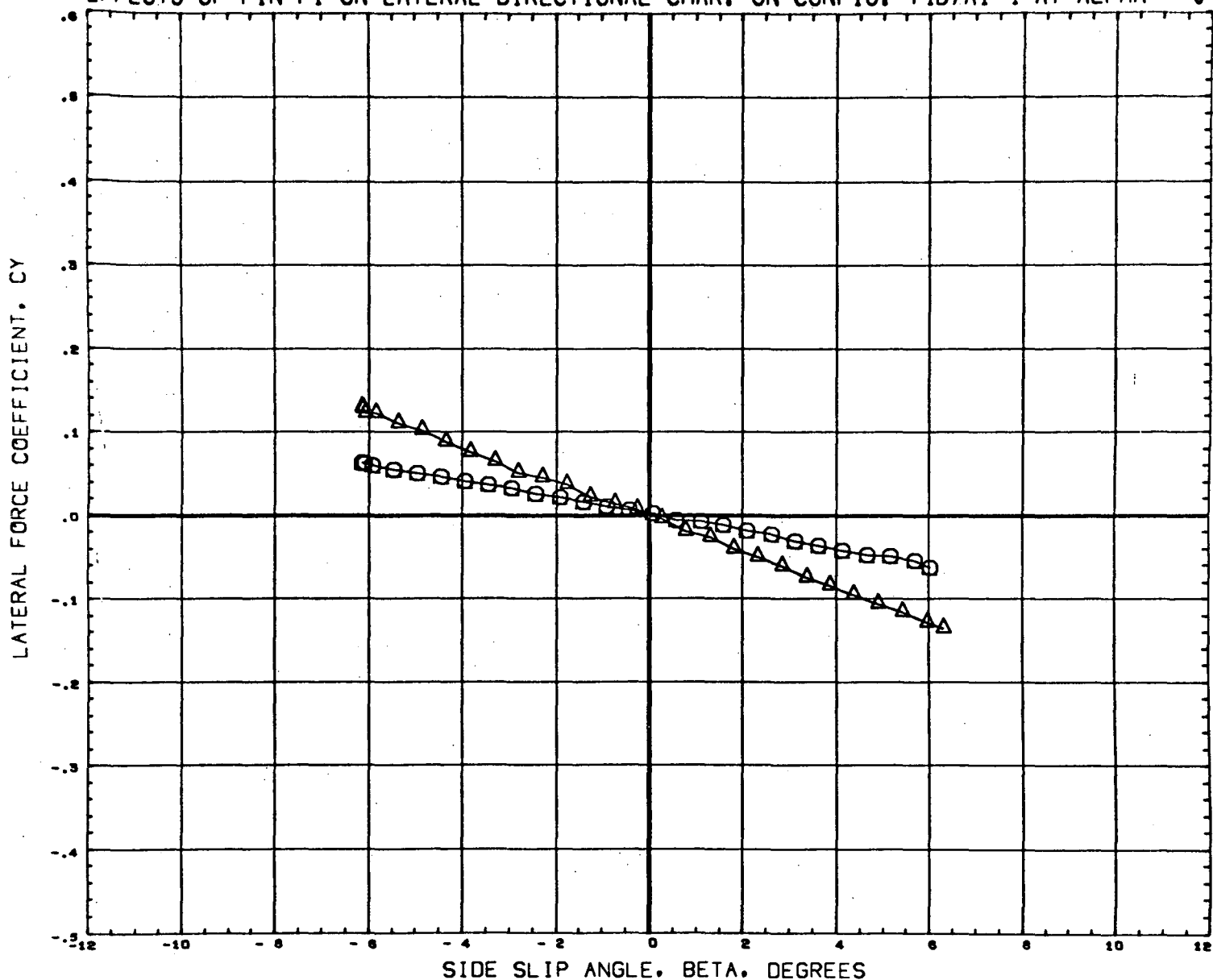
| BETA |
|-------|
| 0.000 |
| 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH 4.47

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EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---------------------------------------|
| (RD7589) | MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (RD7591) | MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4 |

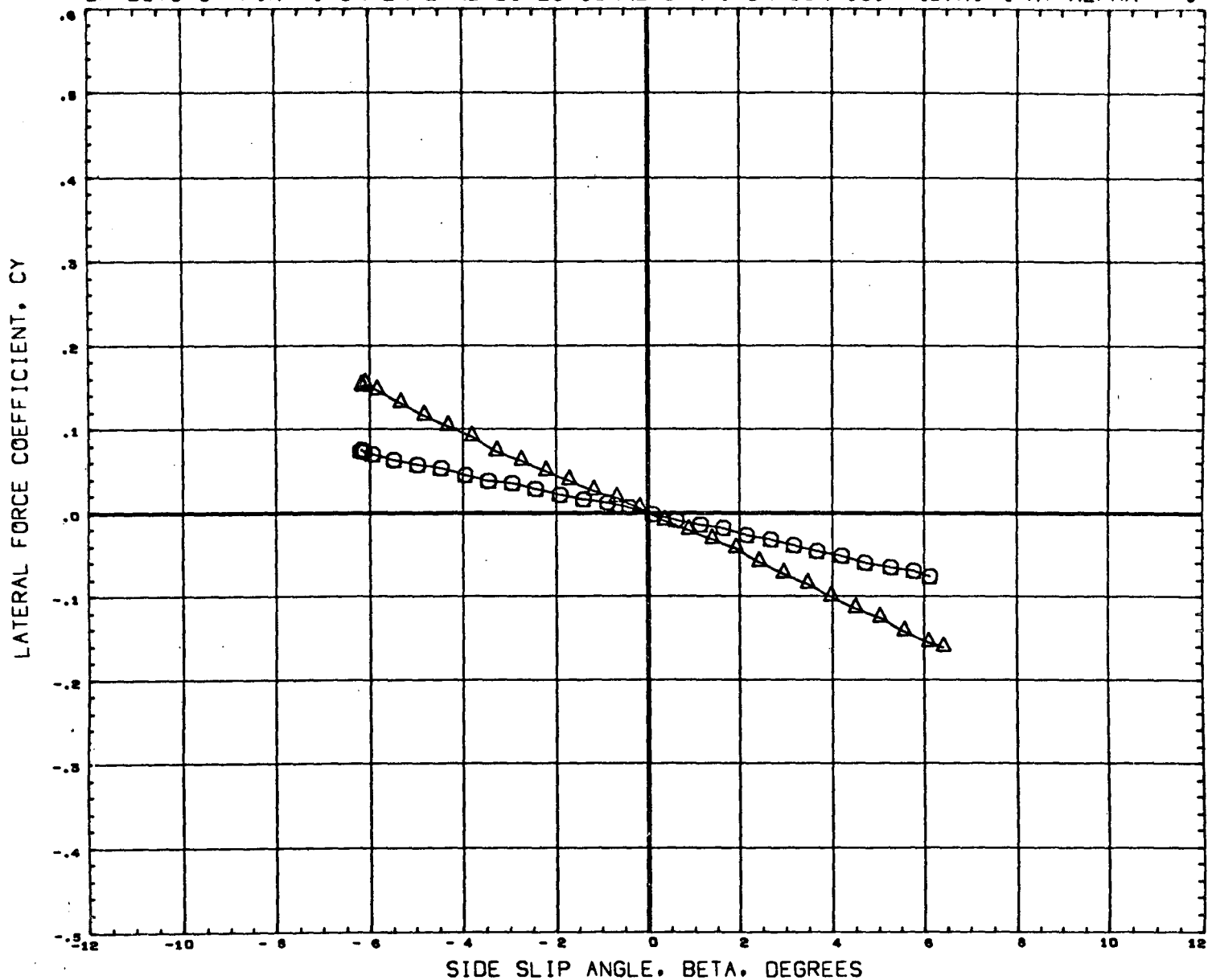
| ALPHA |
|-------|
| 0.000 |
| 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 662.0004 | IN. |
| XMRP | 357.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH .59

PAGE 403

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (RD7589) | MDAC S-222 COMPOSITE (T-CG) T4B7A1-4 |
| (RD7591) | MDAC S-222 COMPOSITE (T-CG) T4F1B7A1-4 |

ALPHA
0.000
0.000

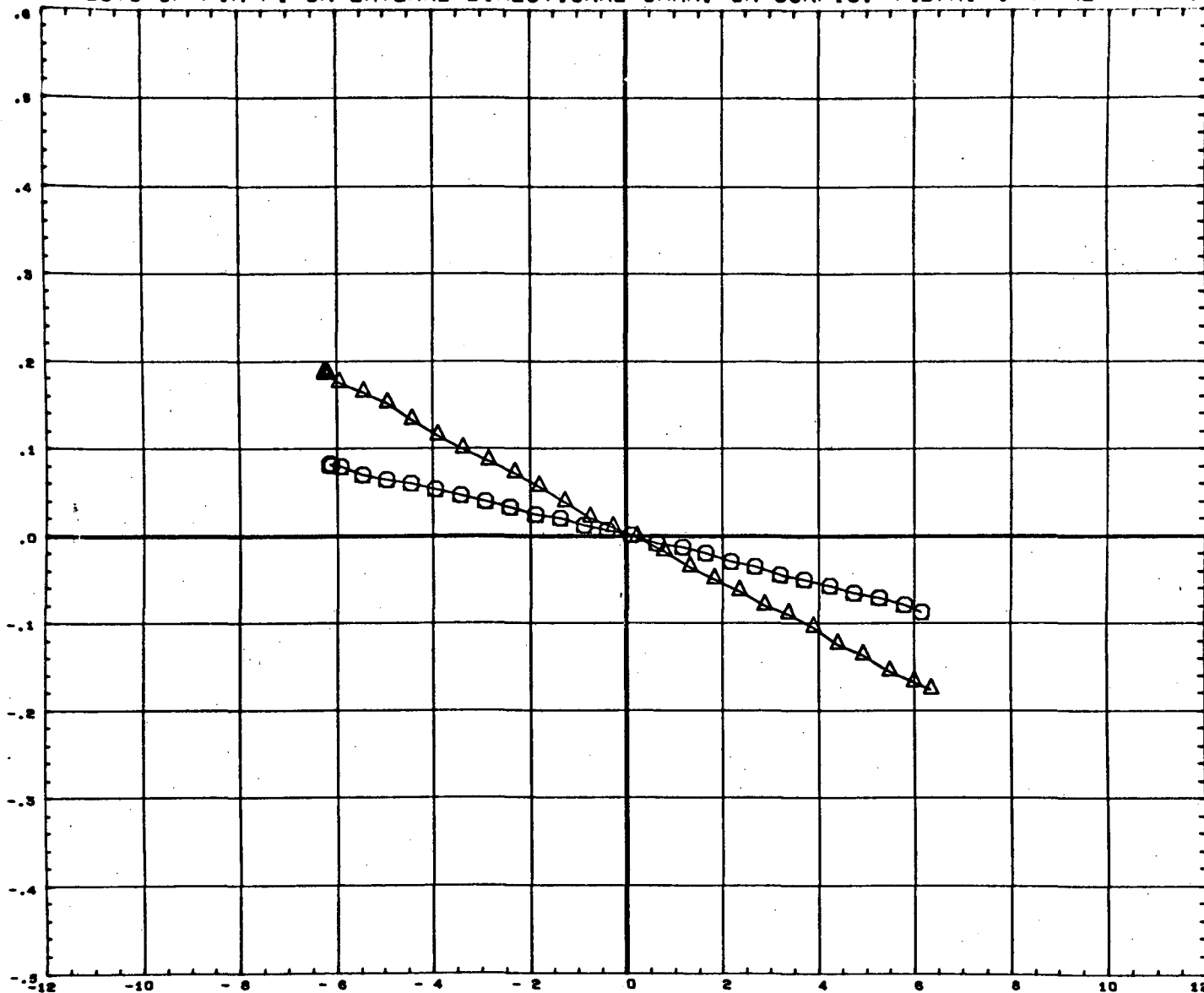
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 537.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH .90

PAGE 404

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0

LATERAL FORCE COEFFICIENT, CY



SIDE SLIP ANGLE, BETA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---------------------------------------|
| (RD7589) ○ | MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (RD7591) △ | MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4 |

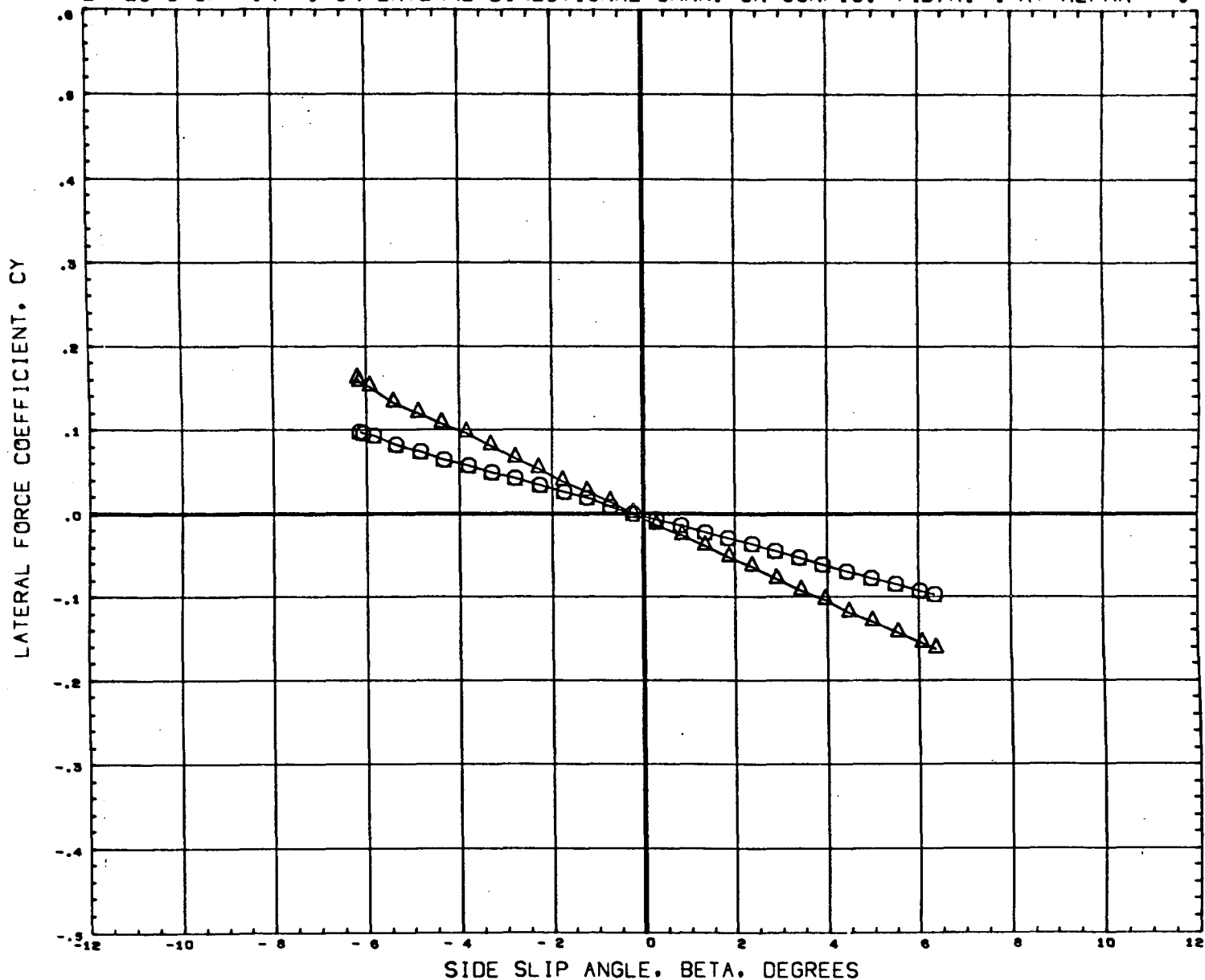
| ALPHA |
|-------|
| 0.000 |
| 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.3004 | IN. |
| BREF | 682.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH 1.10

PAGE 405

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
(RD7589) ○ MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
(RD7591) △ MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4

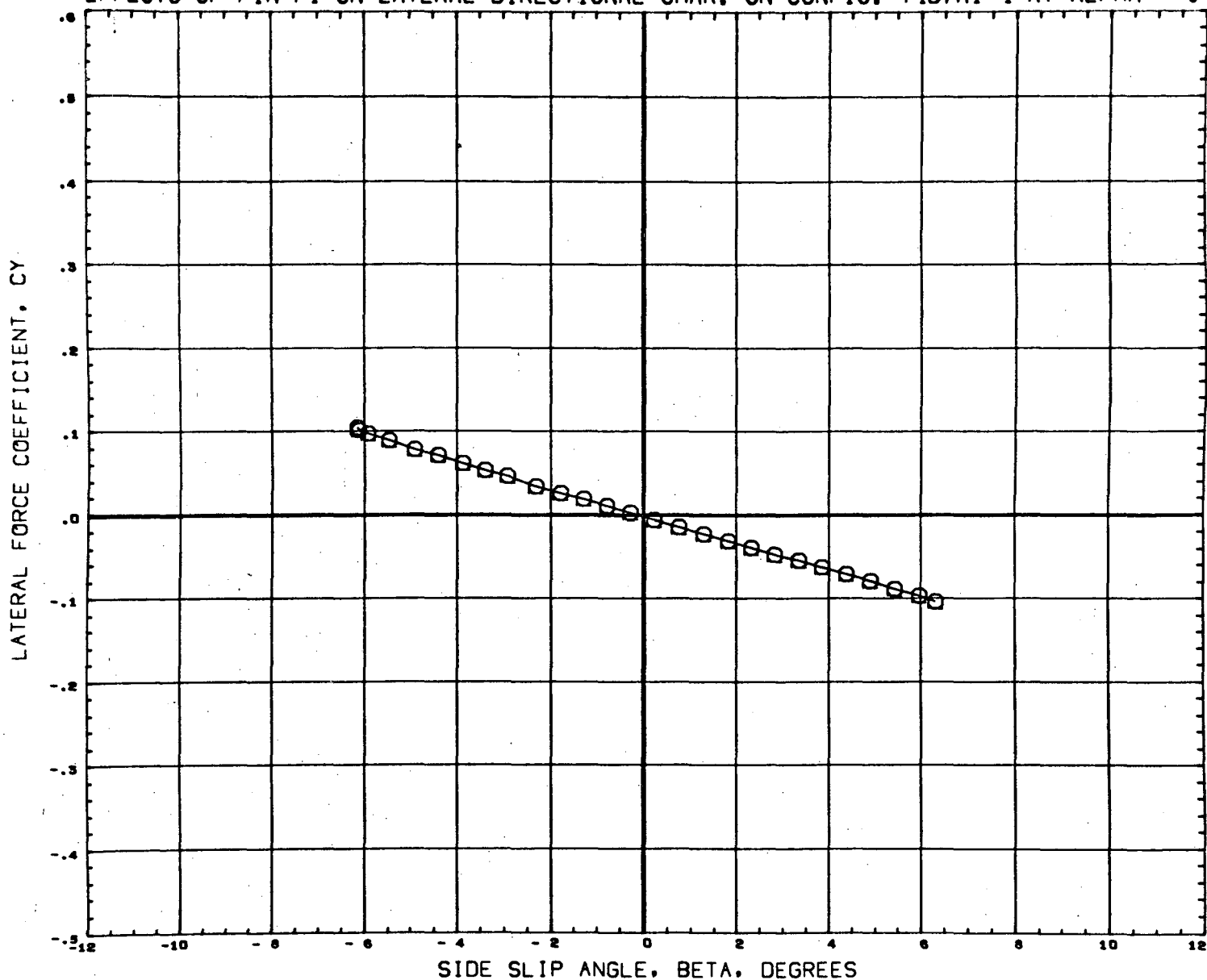
ALPHA
0.000
0.000

REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060

MACH 1.51

PAGE 406

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
(RD7589) MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
(RD7591) DATA NOT AVAILABLE FOR ALL CONDITIONS

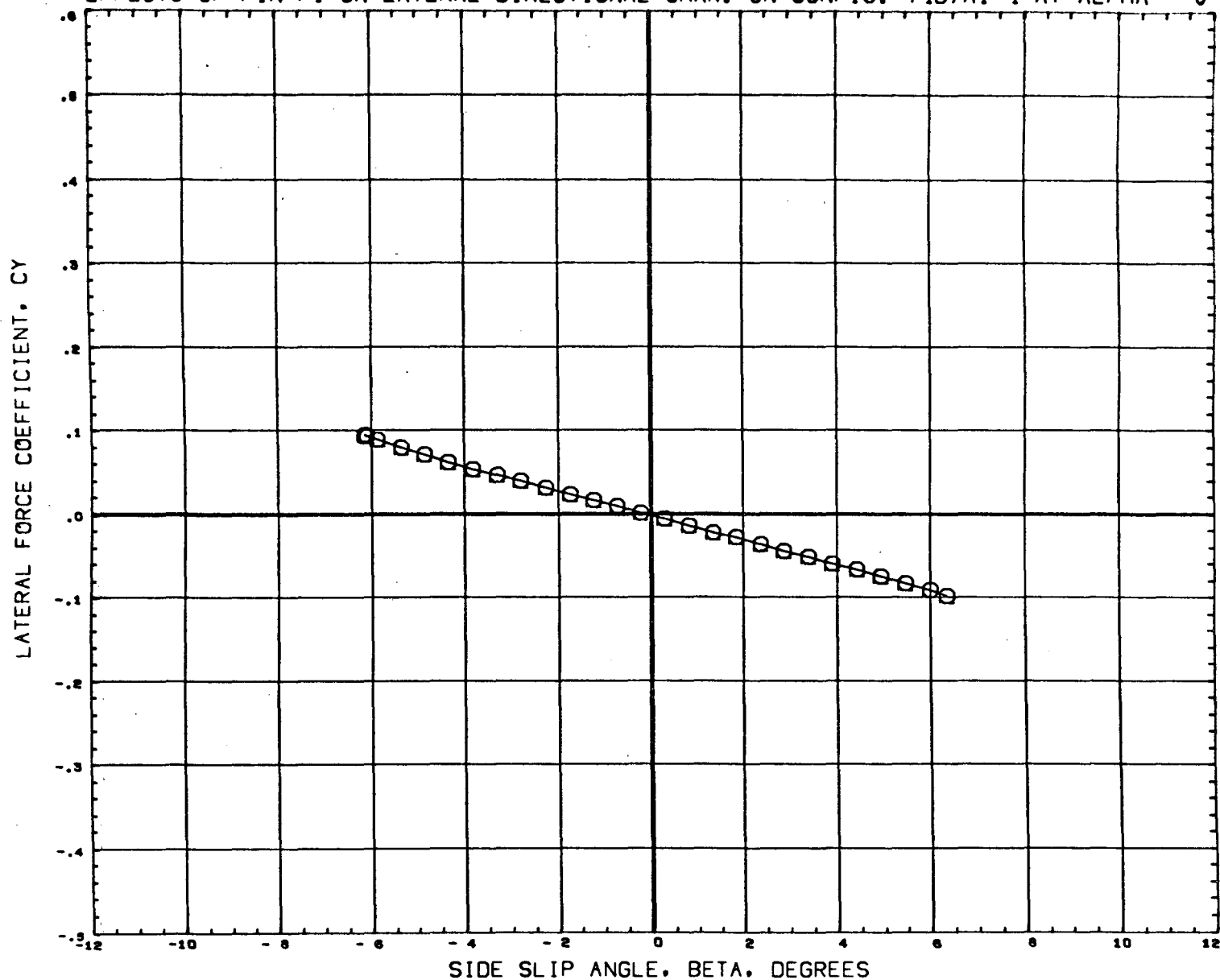
ALPHA
0.000
0.000

REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.3004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060

MACH 2.20

PAGE 407

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
(RD7589) MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
(RD7591) DATA NOT AVAILABLE FOR ALL CONDITIONS

ALPHA
0.000
0.000

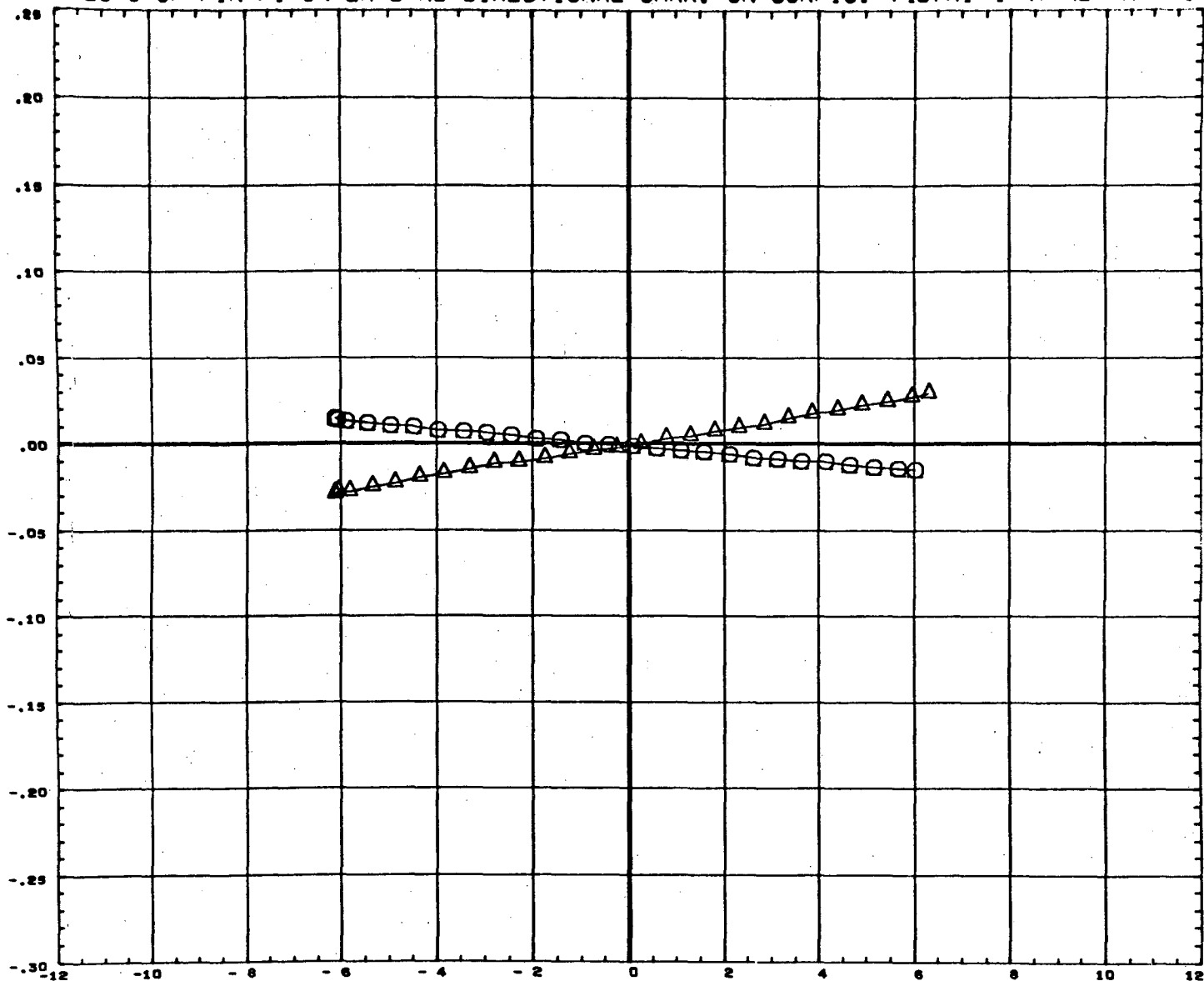
REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060

MACH 4.47

PAGE 408

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0

YAWING MOMENT COEFFICIENT, CYN (BODY AXIS)



DATA SET SYMBOL CONFIGURATION DESCRIPTION
(RD7589) MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
(RD7591) MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4

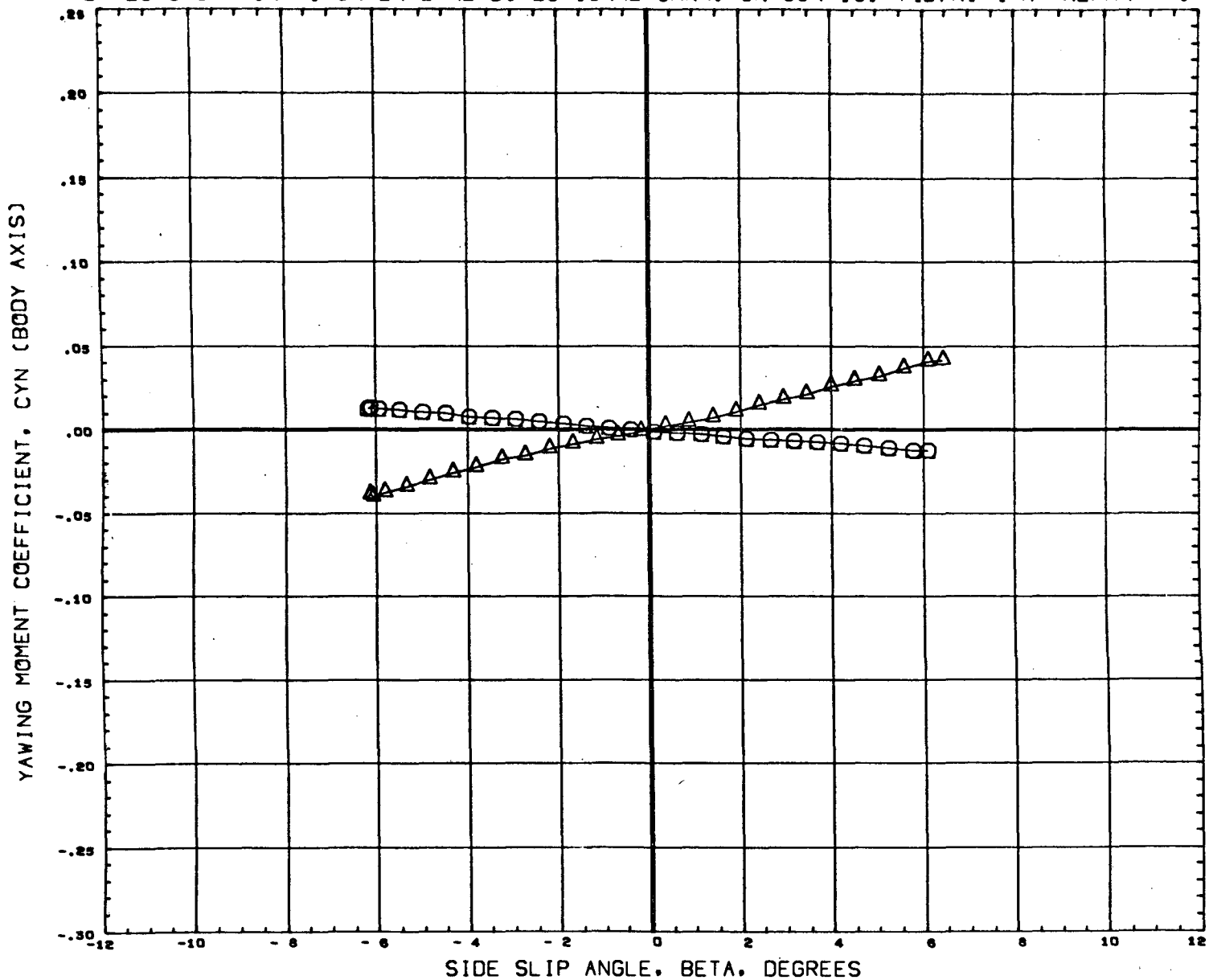
ALPHA
0.000
0.000

REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060

MACH .59

PAGE 409

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
(RD7589) ○ MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
(RD7591) △ MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4

ALPHA
0.000
0.000

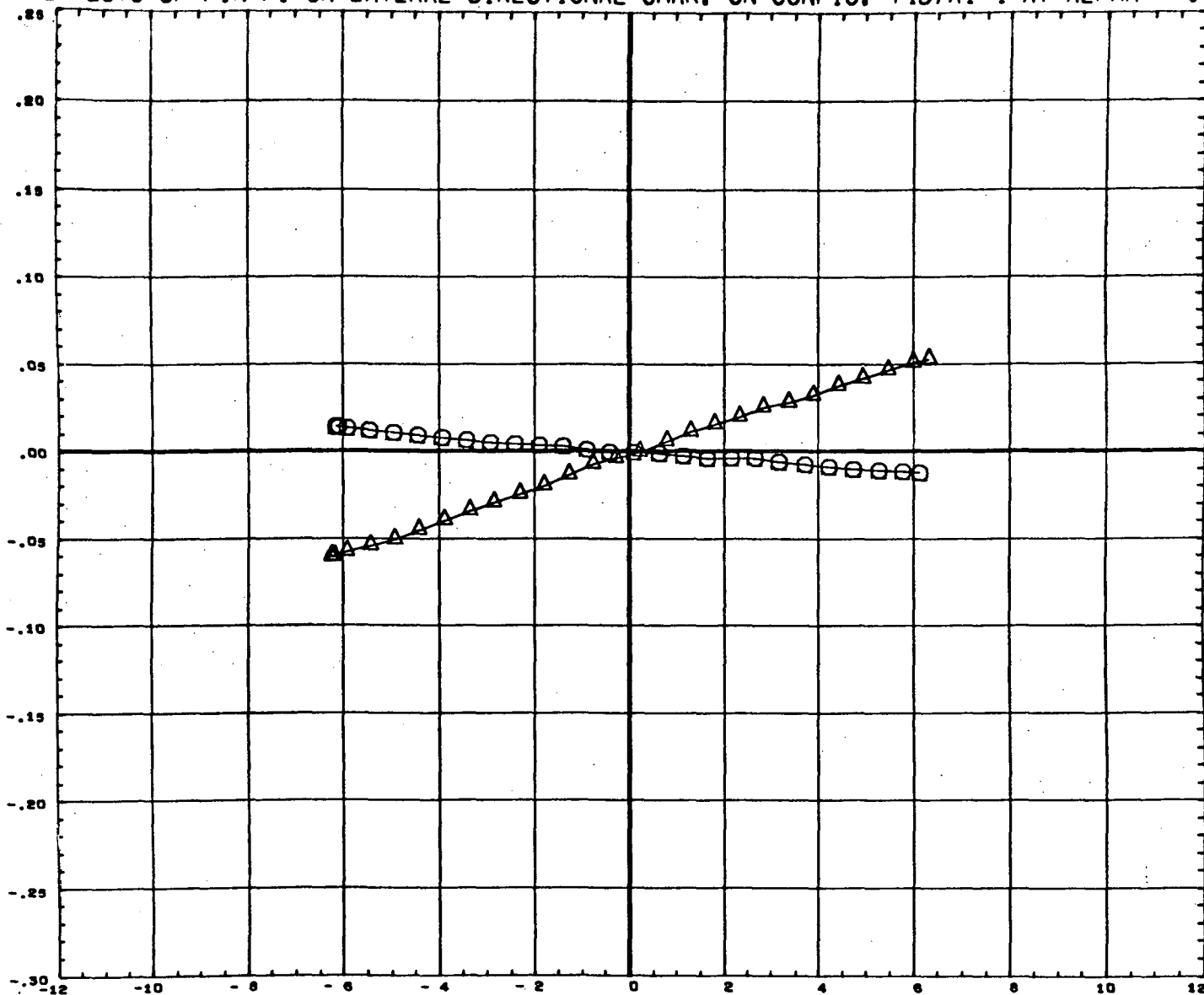
REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060

MACH .90

PAGE 410

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0

YAWING MOMENT COEFFICIENT, CYN (BODY AXIS)



DATA SET SYMBOL CONFIGURATION DESCRIPTION
(RD7589) ○ MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
(RD7591) △ MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4

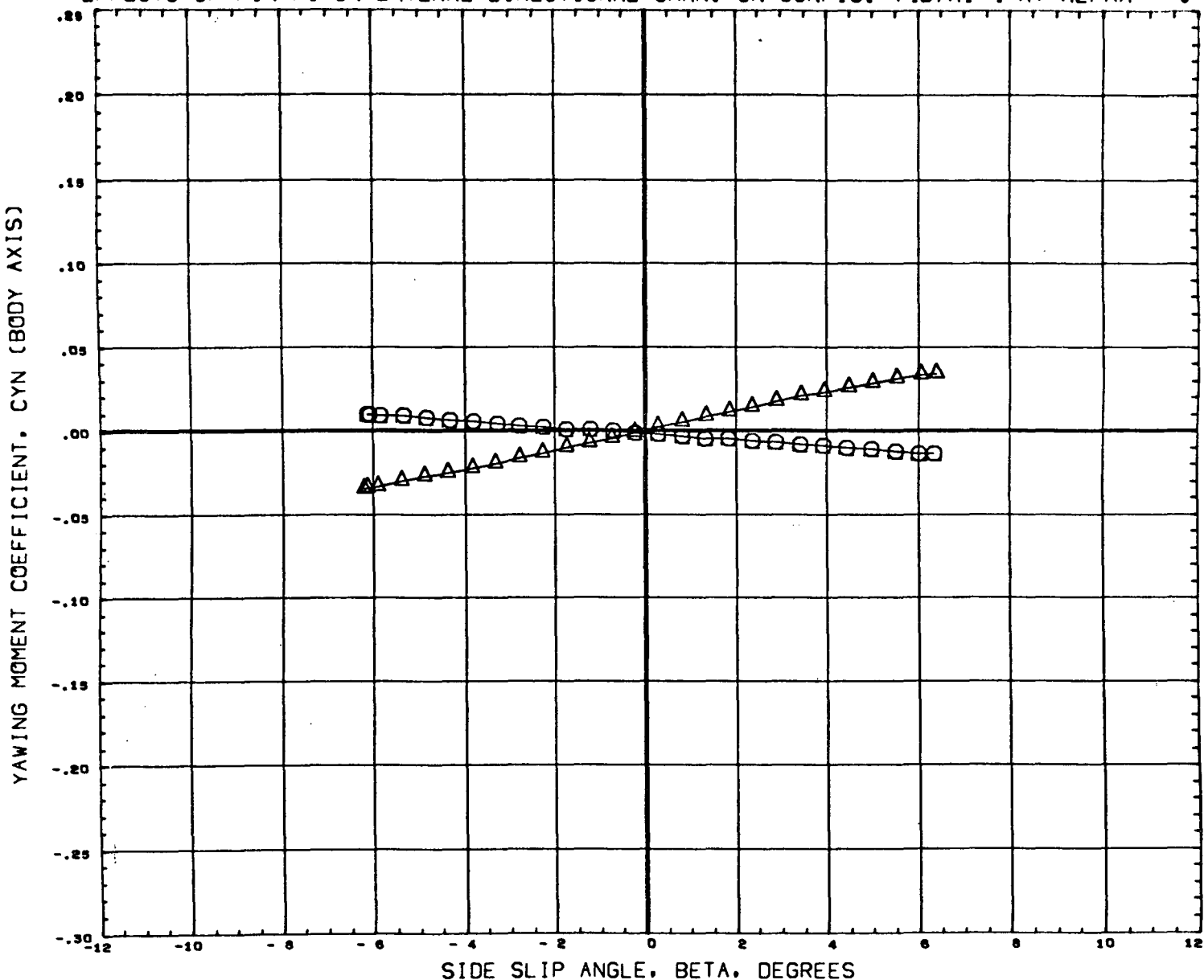
ALPHA
0.000
0.000

REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 662.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060

MACH 1.10

PAGE 411

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (RD7589) MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
 (RD7591) MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4

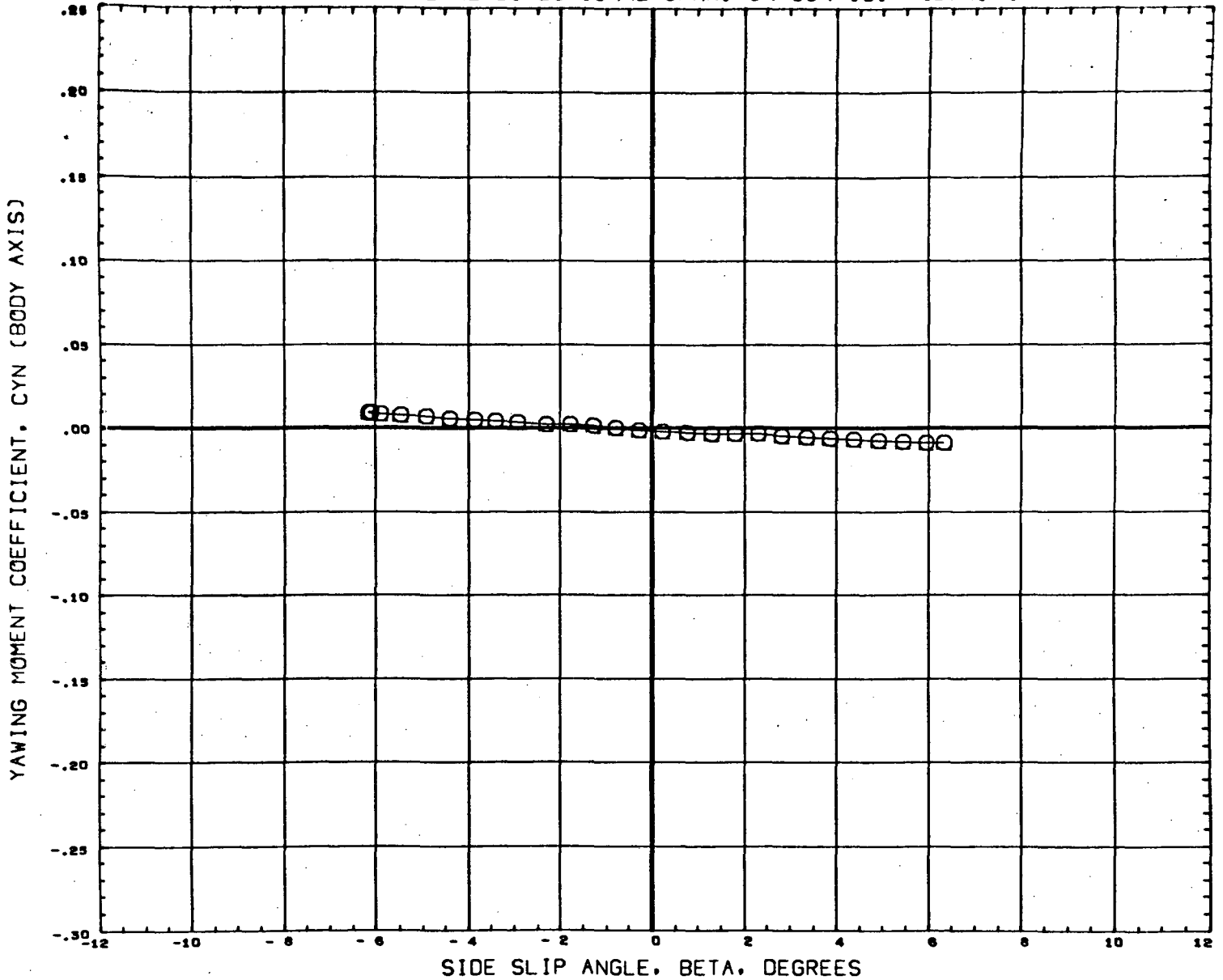
ALPHA
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REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 937.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH 1.51

PAGE 412

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (RD7589) \odot MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
 (RD7591) \triangle DATA NOT AVAILABLE FOR ALL CONDITIONS

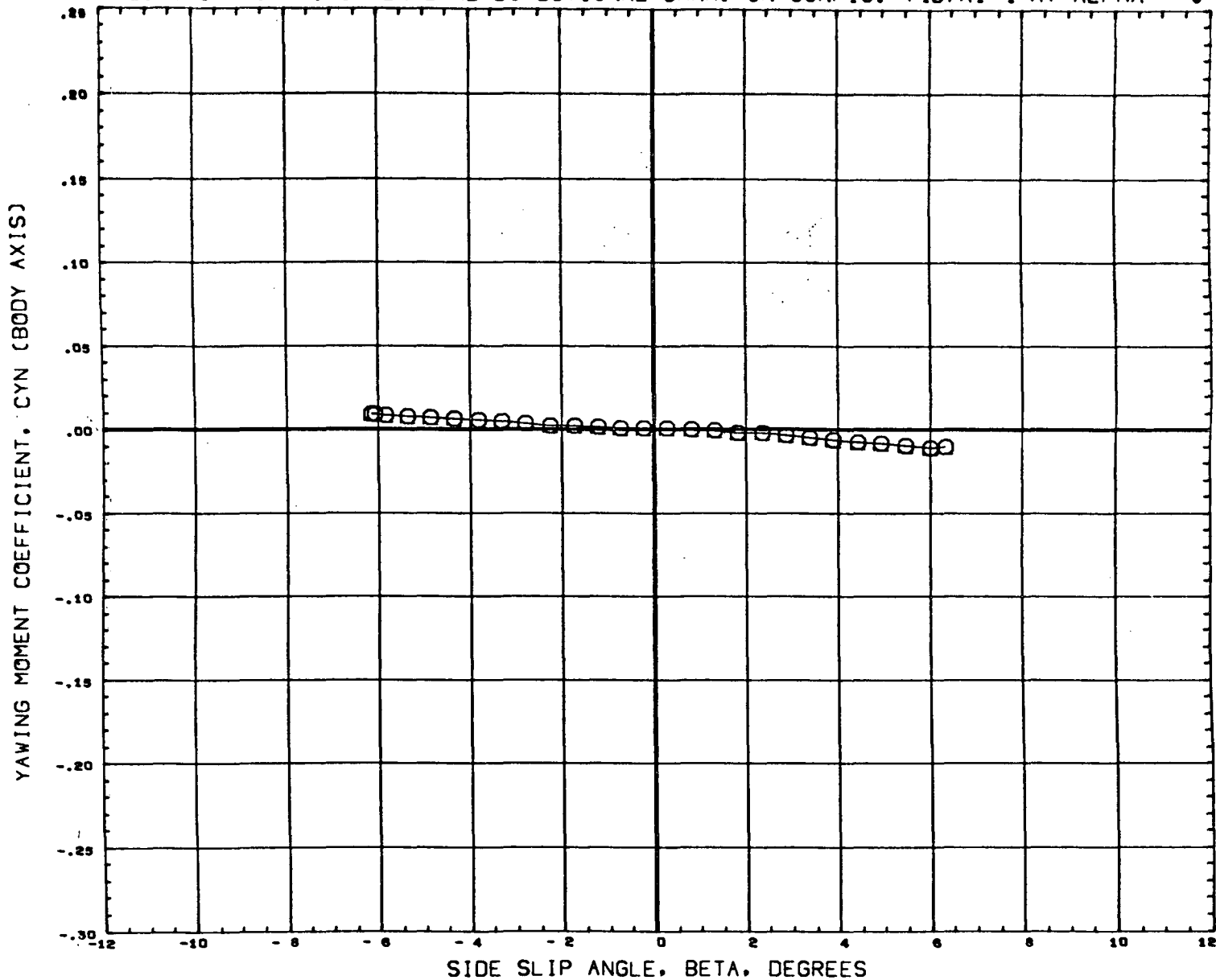
ALPHA
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 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 662.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH 2.20

PAGE 413

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
(RD7589) MDAC S-222 COMPOSITE(T-C6) T4B7A1-4
(RD7591) DATA NOT AVAILABLE FOR ALL CONDITIONS

ALPHA
0.000
0.000

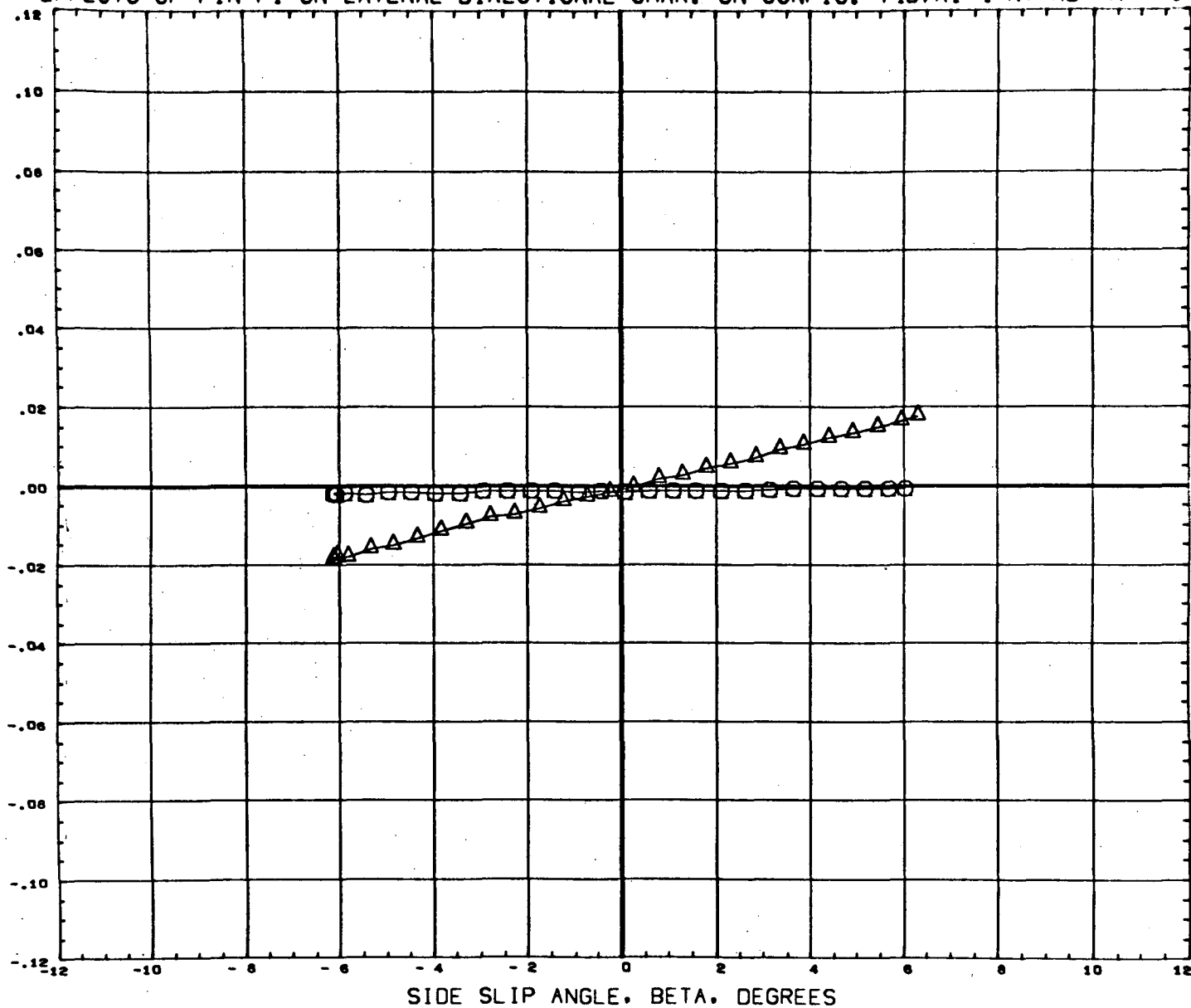
REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 862.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060

MACH 4.47

PAGE 414

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---------------------------------------|
| (RD7389) | MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (RD7391) | MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4 |

ALPHA
0.000
0.000

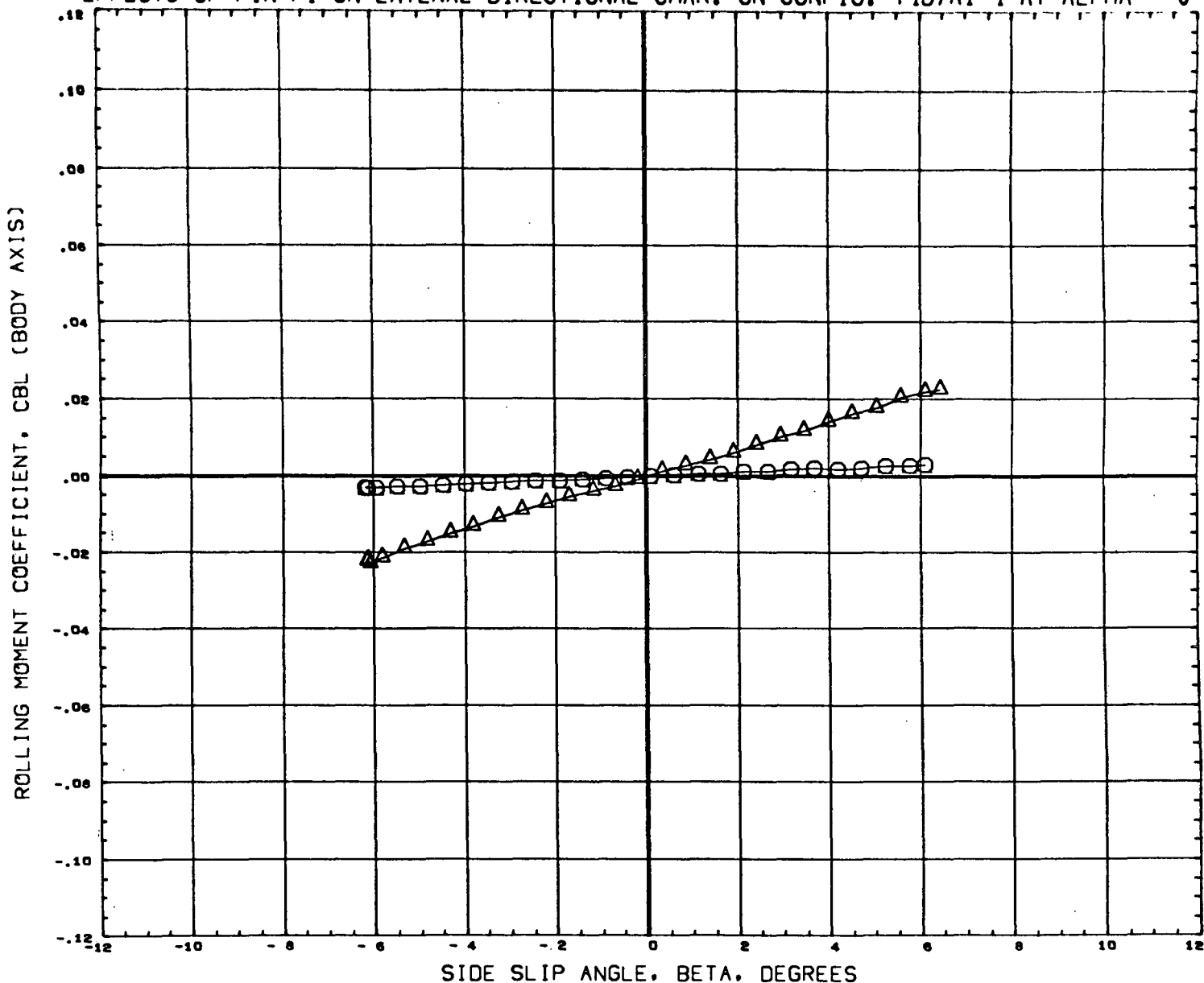
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0069 | |

MACH

.59

PAGE 415

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
(RD7589) MDAC S-222 COMPOSITE (T-CG) T4B7A1-4
(RD7591) MDAC S-222 COMPOSITE (T-CG) T4F1B7A1-4

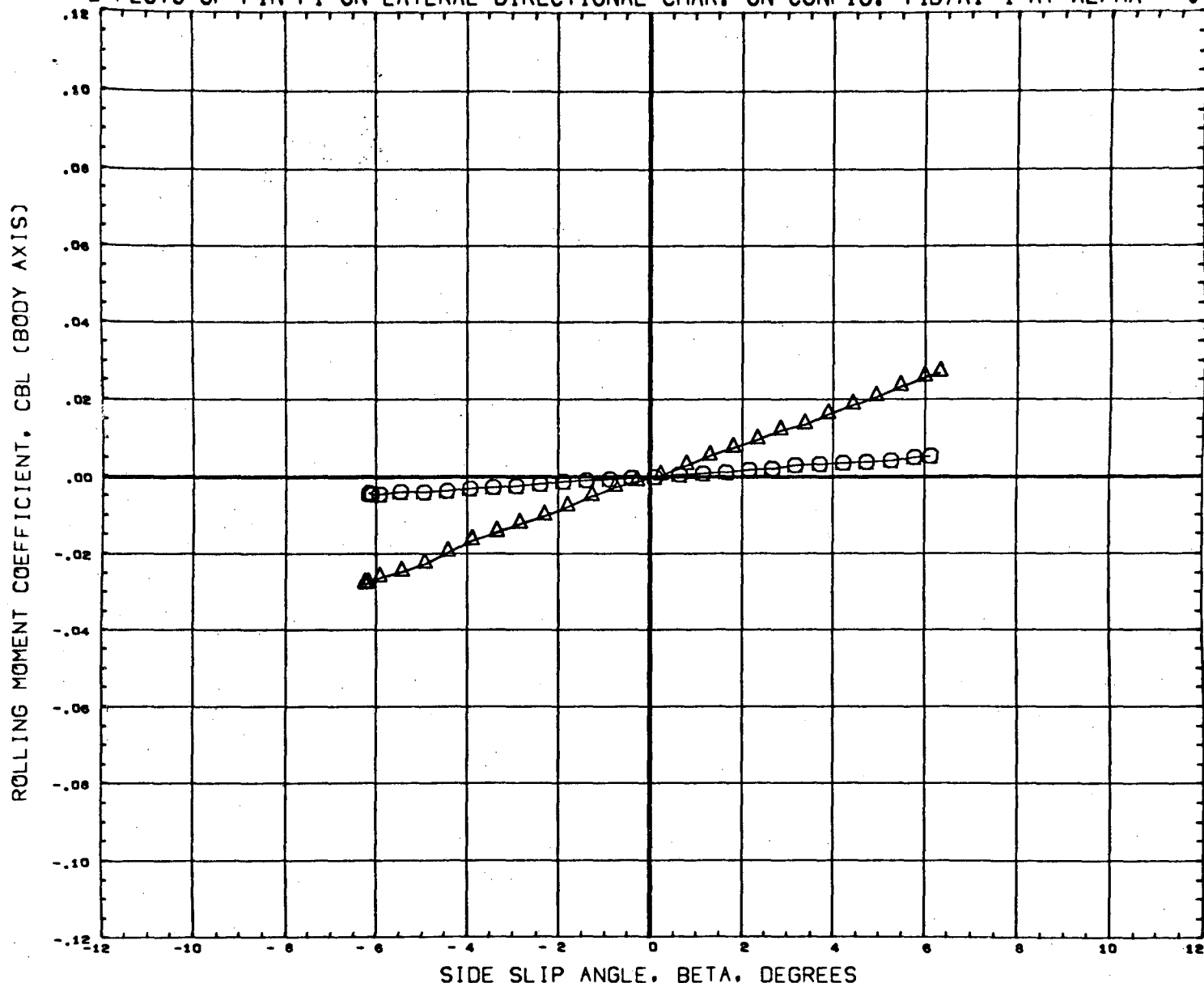
ALPHA
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0.000

REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 982.0004 IN.
XMRP 537.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060

MACH .90

PAGE 416

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---------------------------------------|
| (RD7589) ○ | MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (RD7591) △ | MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4 |

| ALPHA |
|-------|
| 0.000 |
| 0.000 |

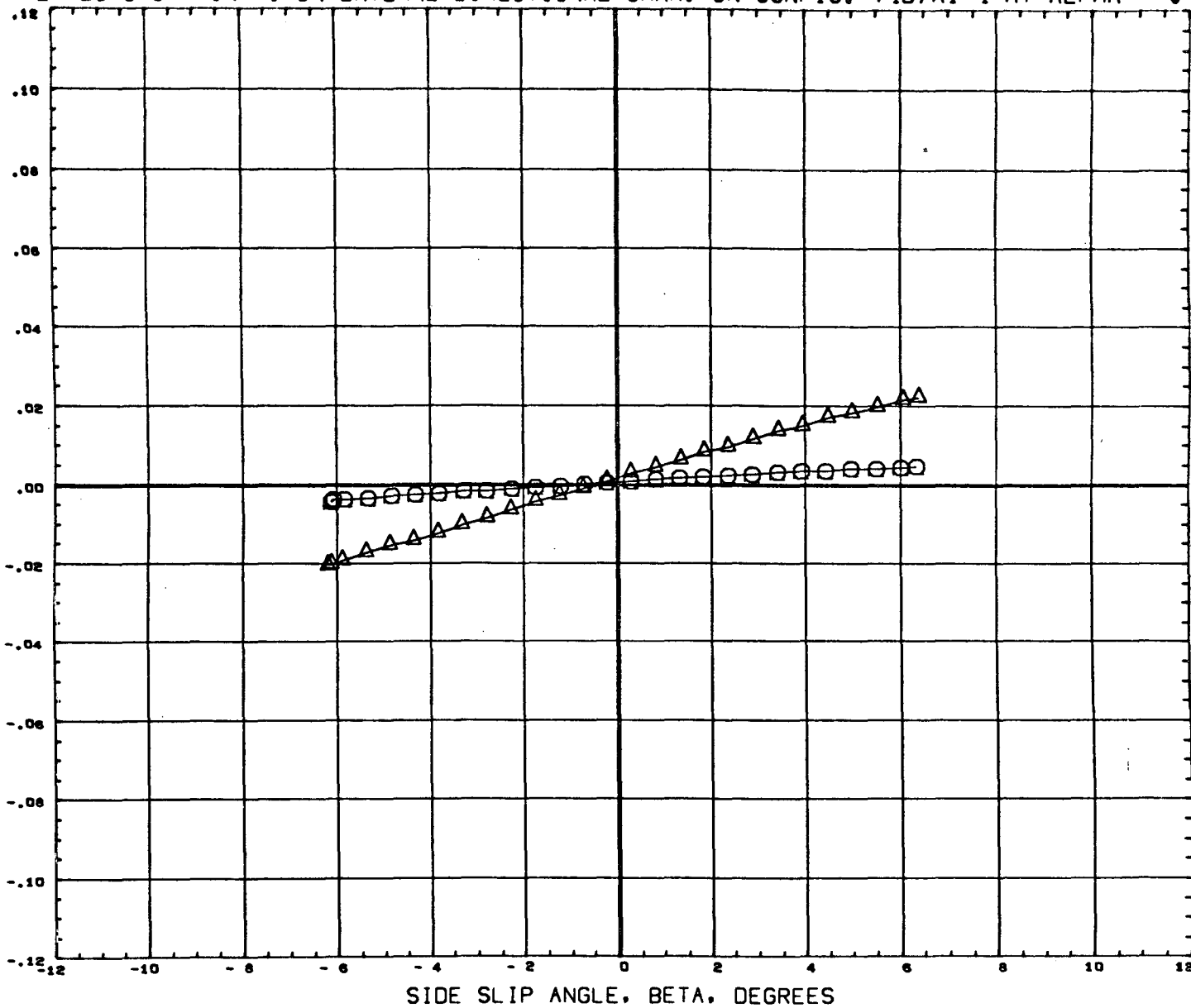
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.3004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 537.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH 1.10

PAGE 417

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (RD7589) MDAC S-222 COMPOSITE (T-CG) T4B7A1-4
 (RD7591) MDAC S-222 COMPOSITE (T-CG) T4F1B7A1-4

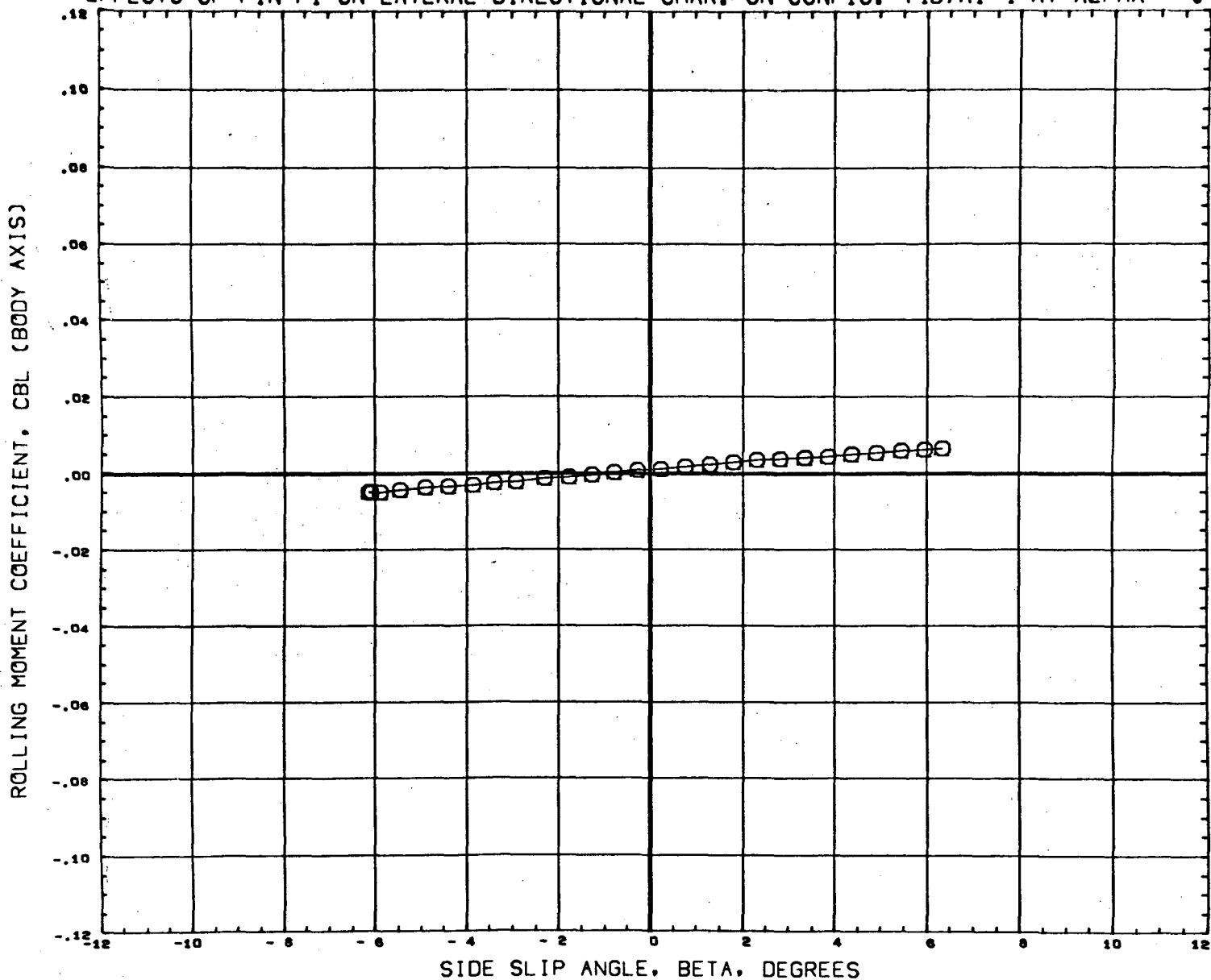
ALPHA
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 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH 1.51

PAGE 418

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
(RD7589) \odot MDAC S-222 COMPOSITE (T-CG) T4B7A1-4
(RD7591) \otimes DATA NOT AVAILABLE FOR ALL CONDITIONS

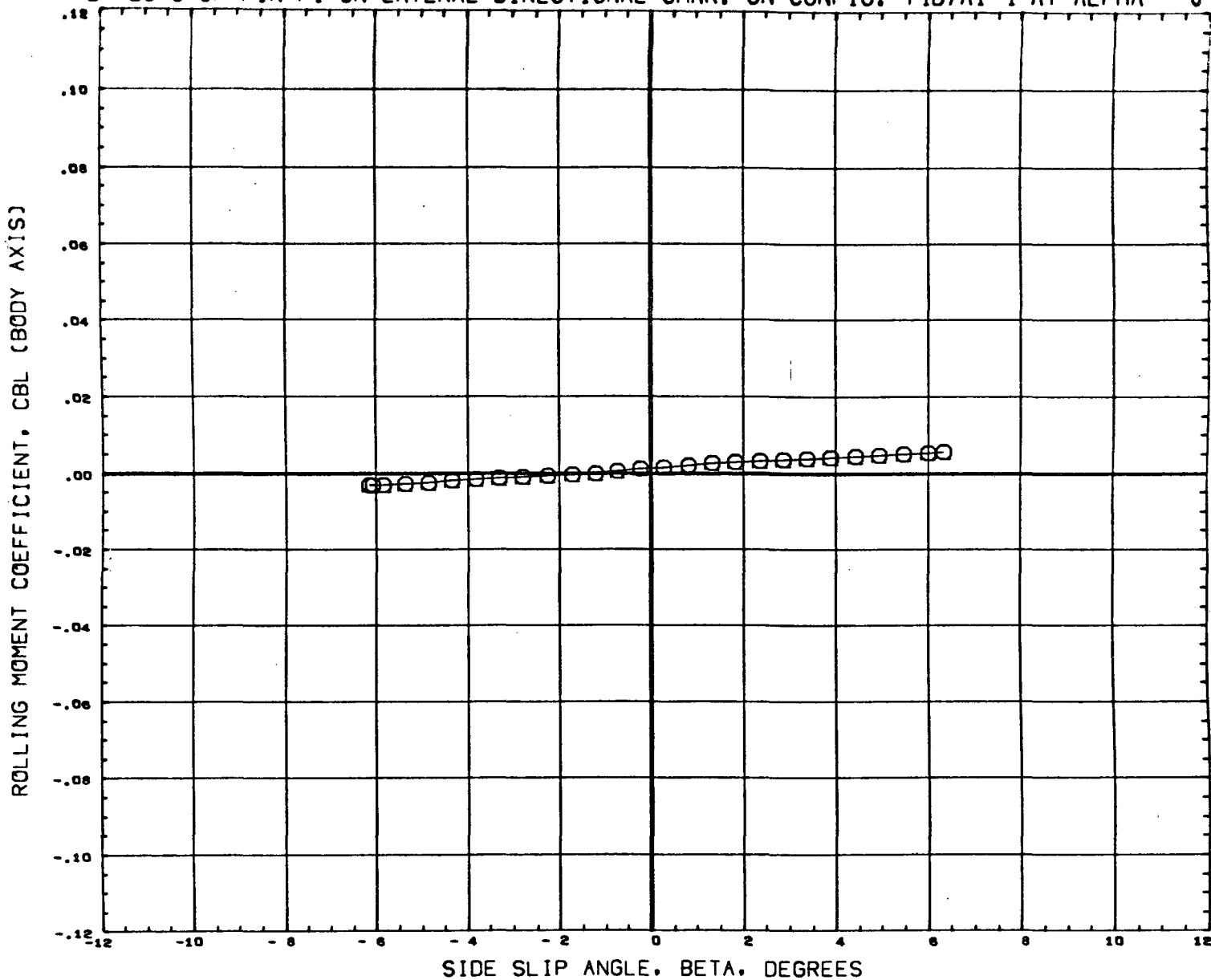
ALPHA
0.000
0.000

REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 809.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060

MACH 2.20

PAGE 419

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL (RD7589) (RD7591) CONFIGURATION DESCRIPTION MDAC S-222 COMPOSITE (T-CG) T4B7A1-4 DATA NOT AVAILABLE FOR ALL CONDITIONS

ALPHA 0.000 0.000

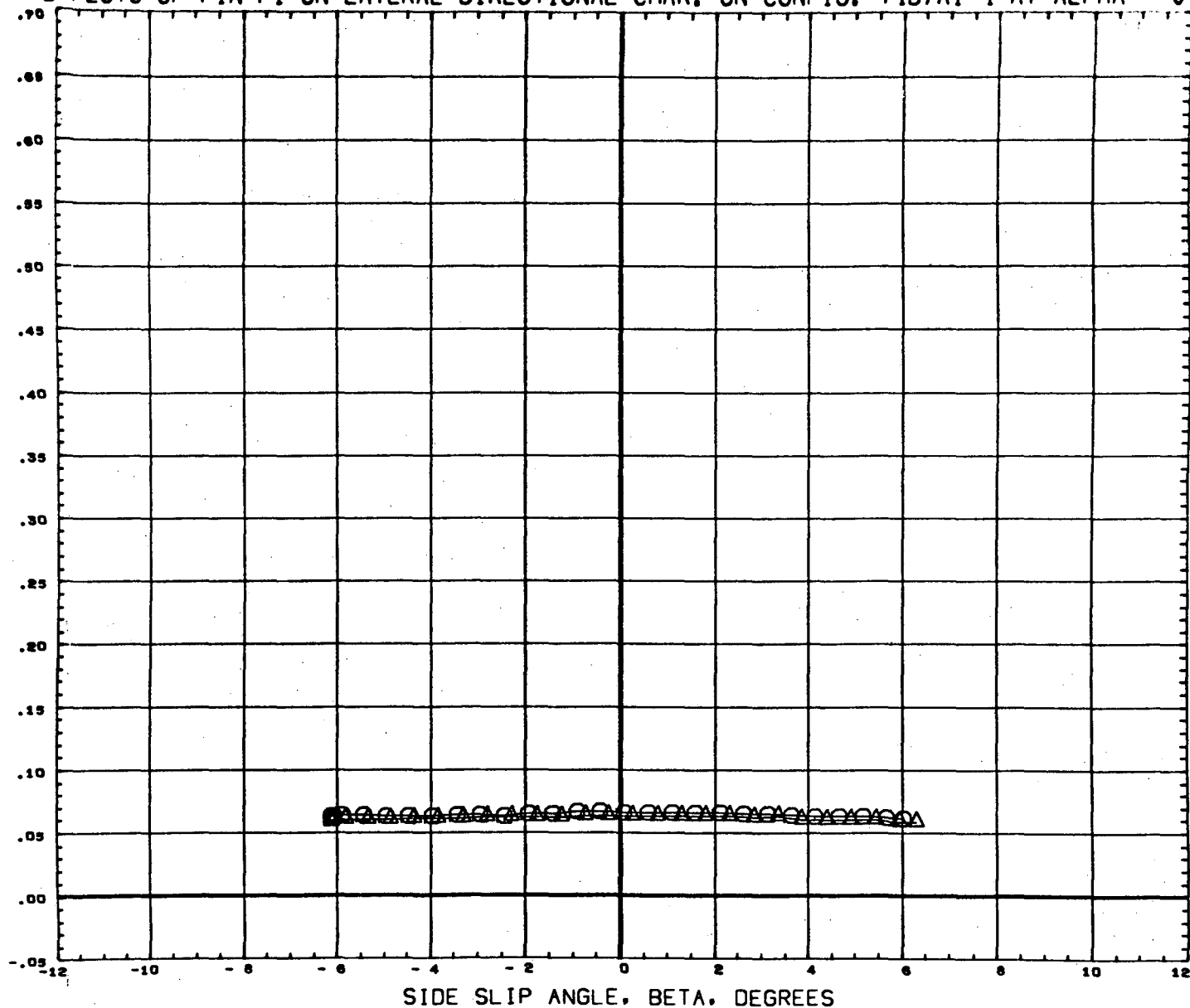
REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060

MACH 4.47

PAGE 420

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



DATA SET SYMBOL CONFIGURATION DESCRIPTION
(RD7589) MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
(RD7591) MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4

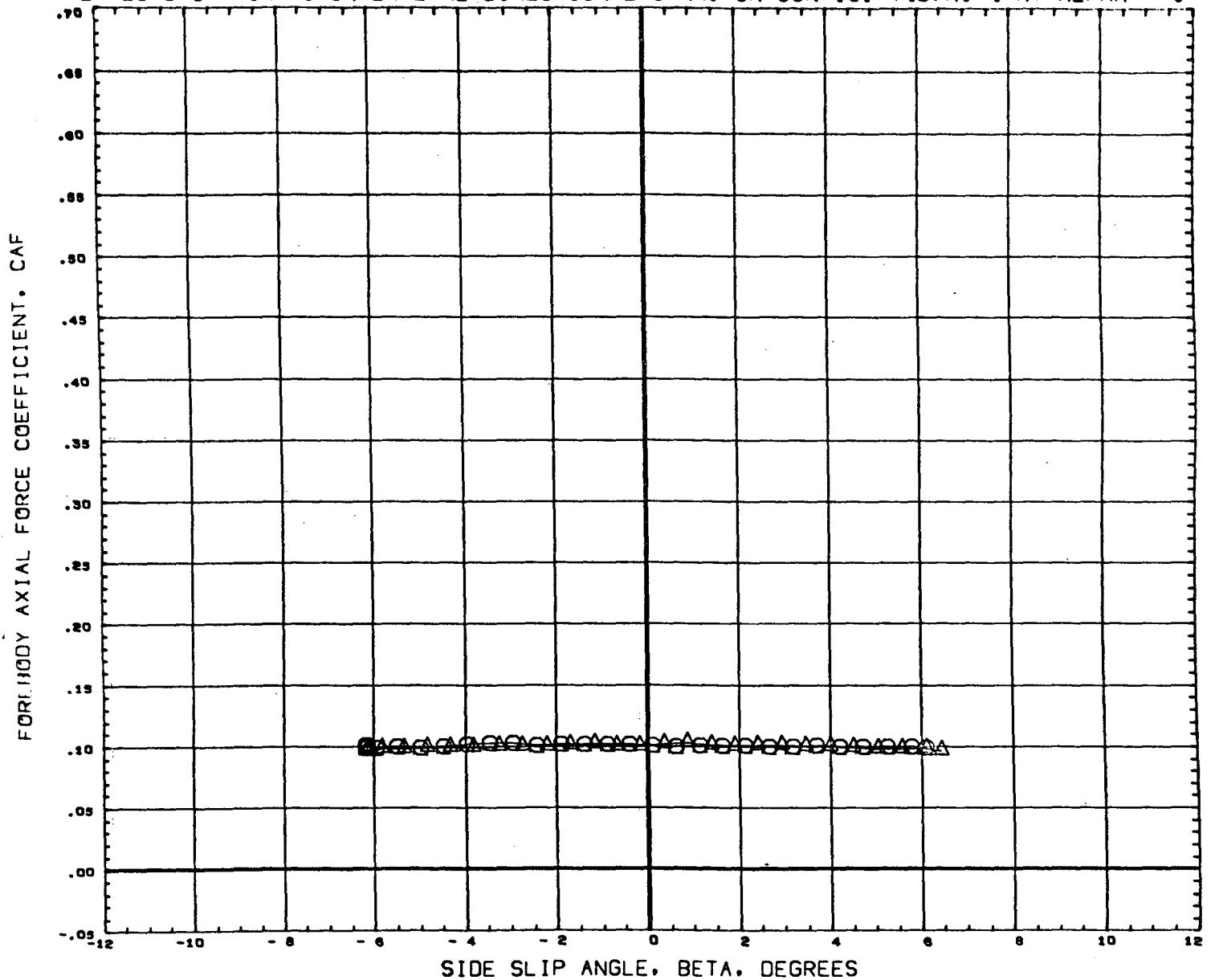
ALPHA
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0.000

REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.3004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060

MACH .59

PAGE 421

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
(RD7589) MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
(RD7591) MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4

ALPHA
0.000
0.000

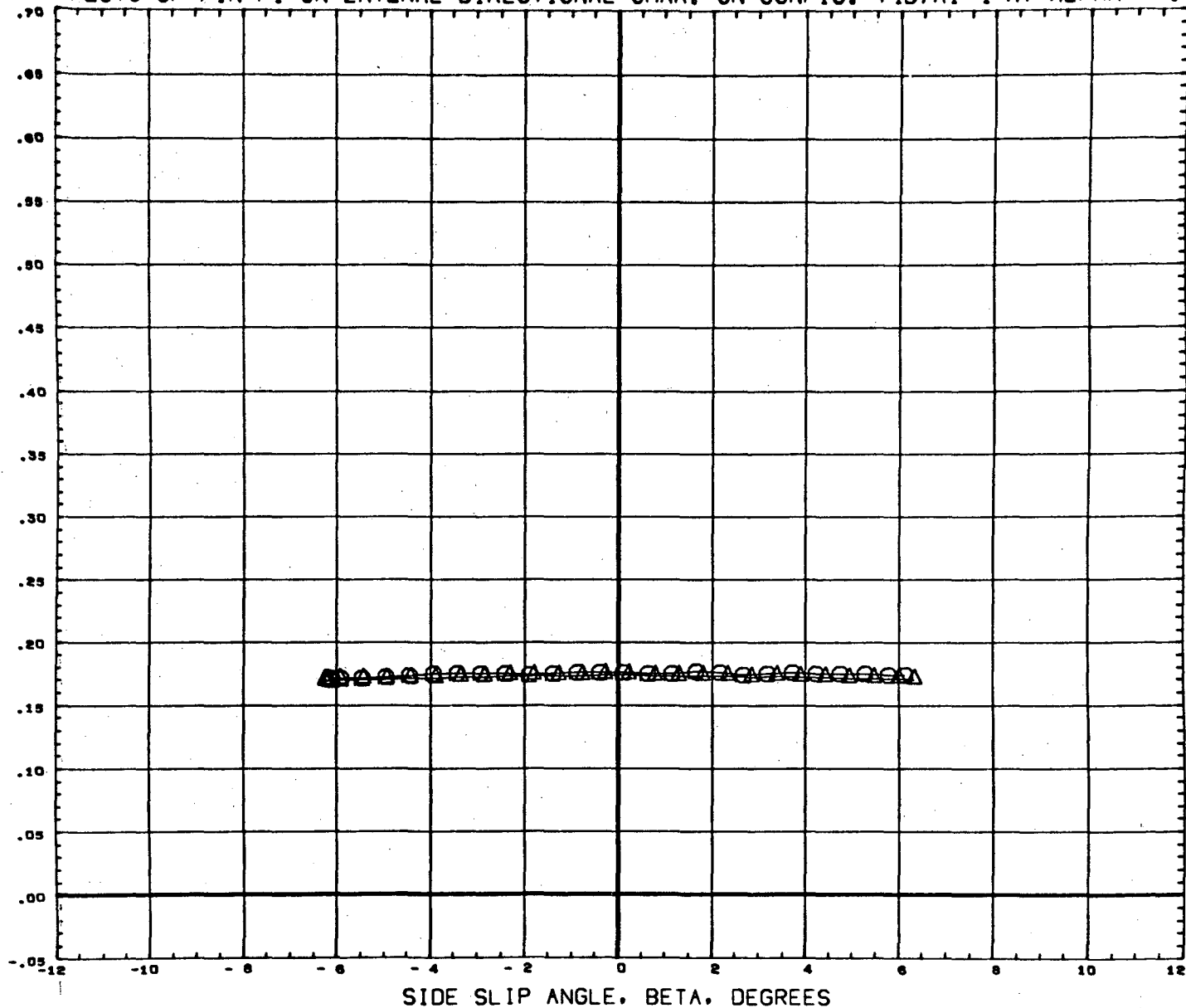
REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 937.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060

MACH .90

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EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---------------------------------------|
| (RD7589) | MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (RD7591) | MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4 |

| ALPHA |
|-------|
| 0.000 |
| 0.000 |

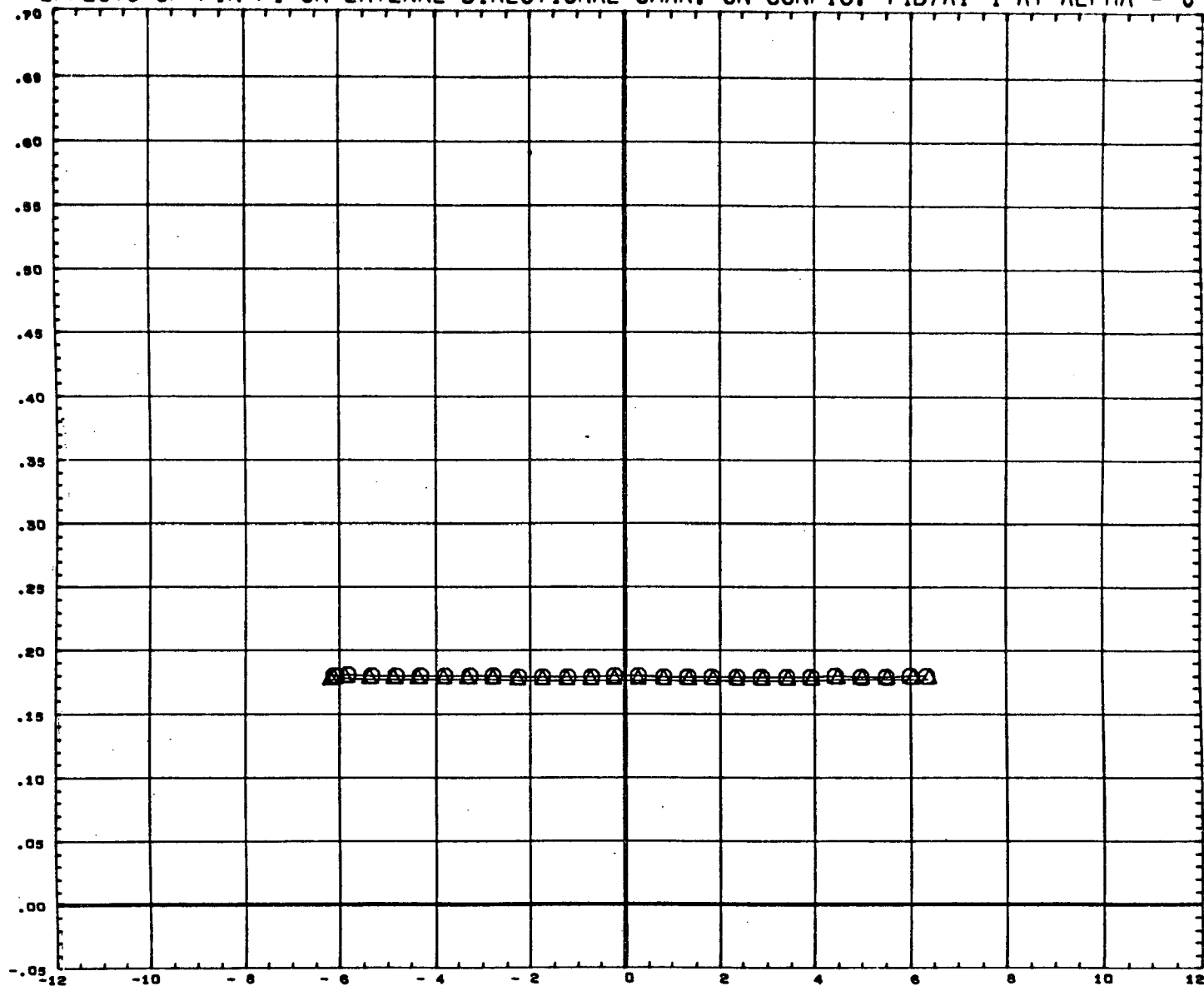
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH 1.10

PAGE 423

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



SIDE SLIP ANGLE, BETA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---------------------------------------|
| (RD7589) | MDAC S-222 COMPOSITE(T-CG) T4B7A1-4 |
| (RD7591) | MDAC S-222 COMPOSITE(T-CG) T4F1B7A1-4 |

| ALPHA |
|-------|
| 0.000 |
| 0.000 |

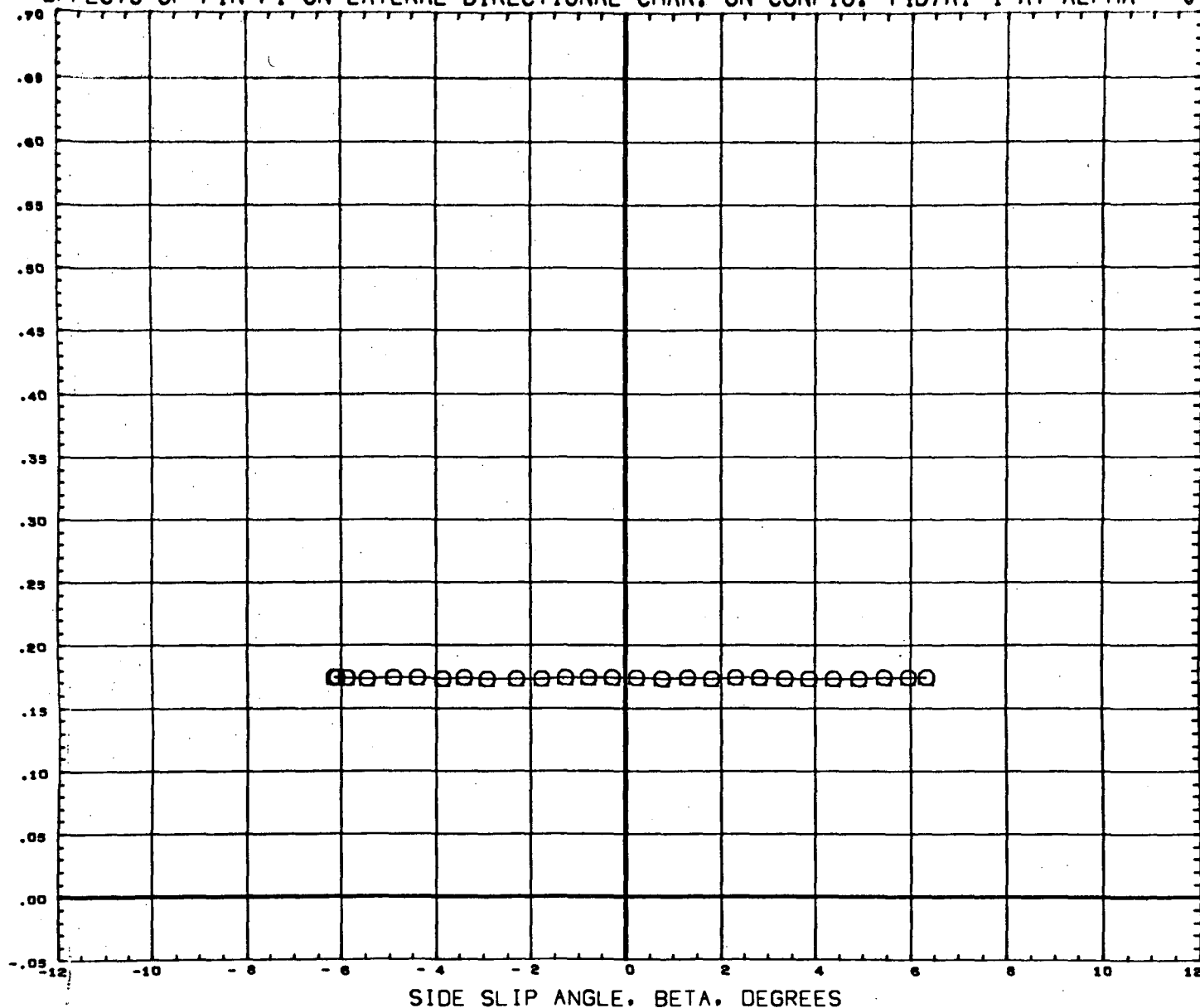
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 937.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | |

MACH 1.51

PAGE 424

EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



DATA SET SYMBOL CONFIGURATION DESCRIPTION
(RD7589) Δ MDAC S-222 COMPOSITE(T-CG) T4B7A1-4
(RD7591) Δ DATA NOT AVAILABLE FOR ALL CONDITIONS

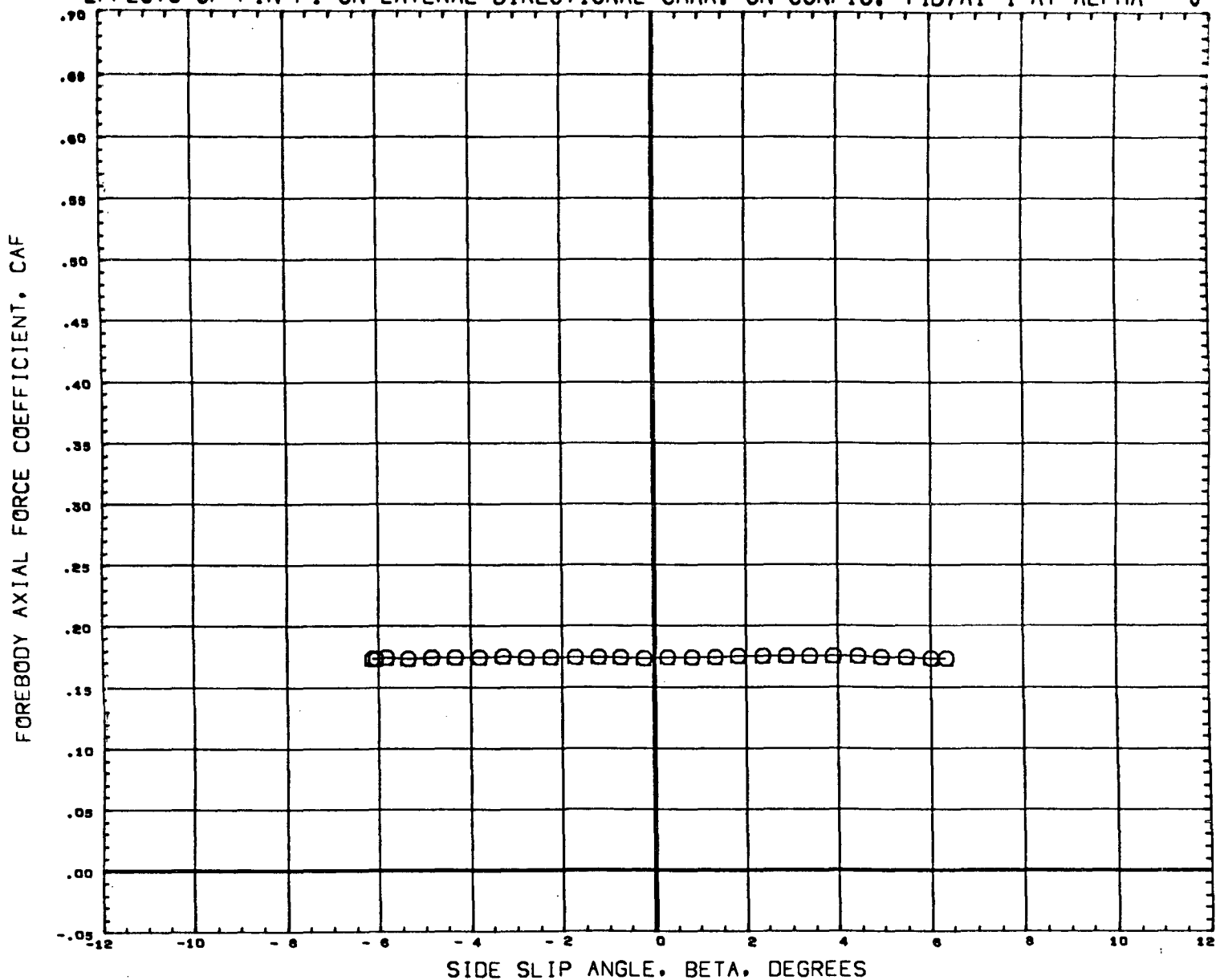
ALPHA
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0.000

REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060

MACH 2.20

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EFFECTS OF FIN F1 ON LATERAL-DIRECTIONAL CHAR. ON CONFIG. T4B7A1-4 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
(RD7589) MDAC S-222 COMPOSITE (T-CG) T4B7A1-4
(RD7591) DATA NOT AVAILABLE FOR ALL CONDITIONS

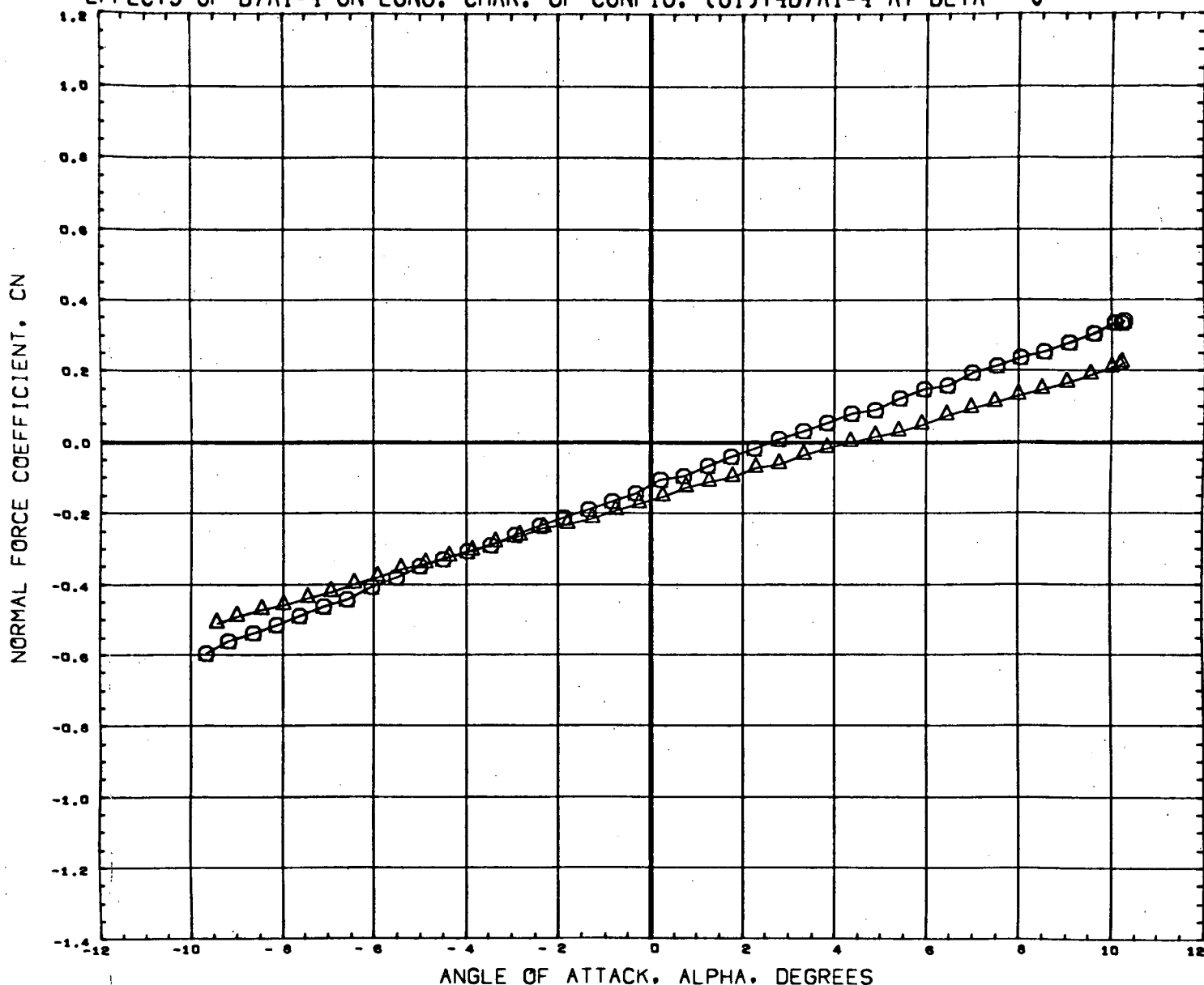
ALPHA
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0.000

REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060

MACH 4.47

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EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (O1)T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 |
| (CD7409) | MDAC S-222 COMPOSITE (T-CG) (O1)T4 |

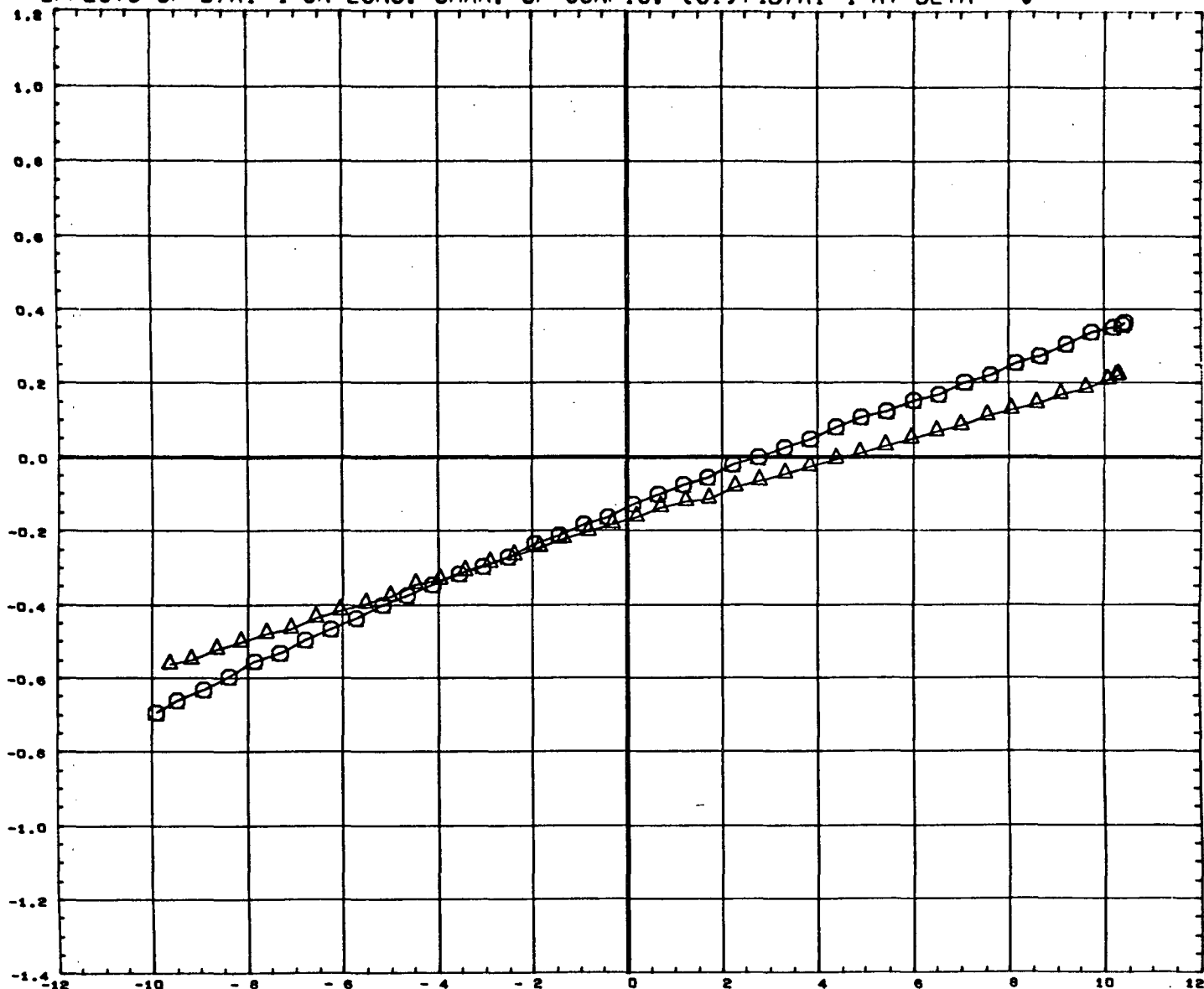
| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 662.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH .58

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EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0

NORMAL FORCE COEFFICIENT, CN



ANGLE OF ATTACK, ALPHA, DEGREES

DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74D9) MDAC S-222 COMPOSITE(T-CG) (01)T4

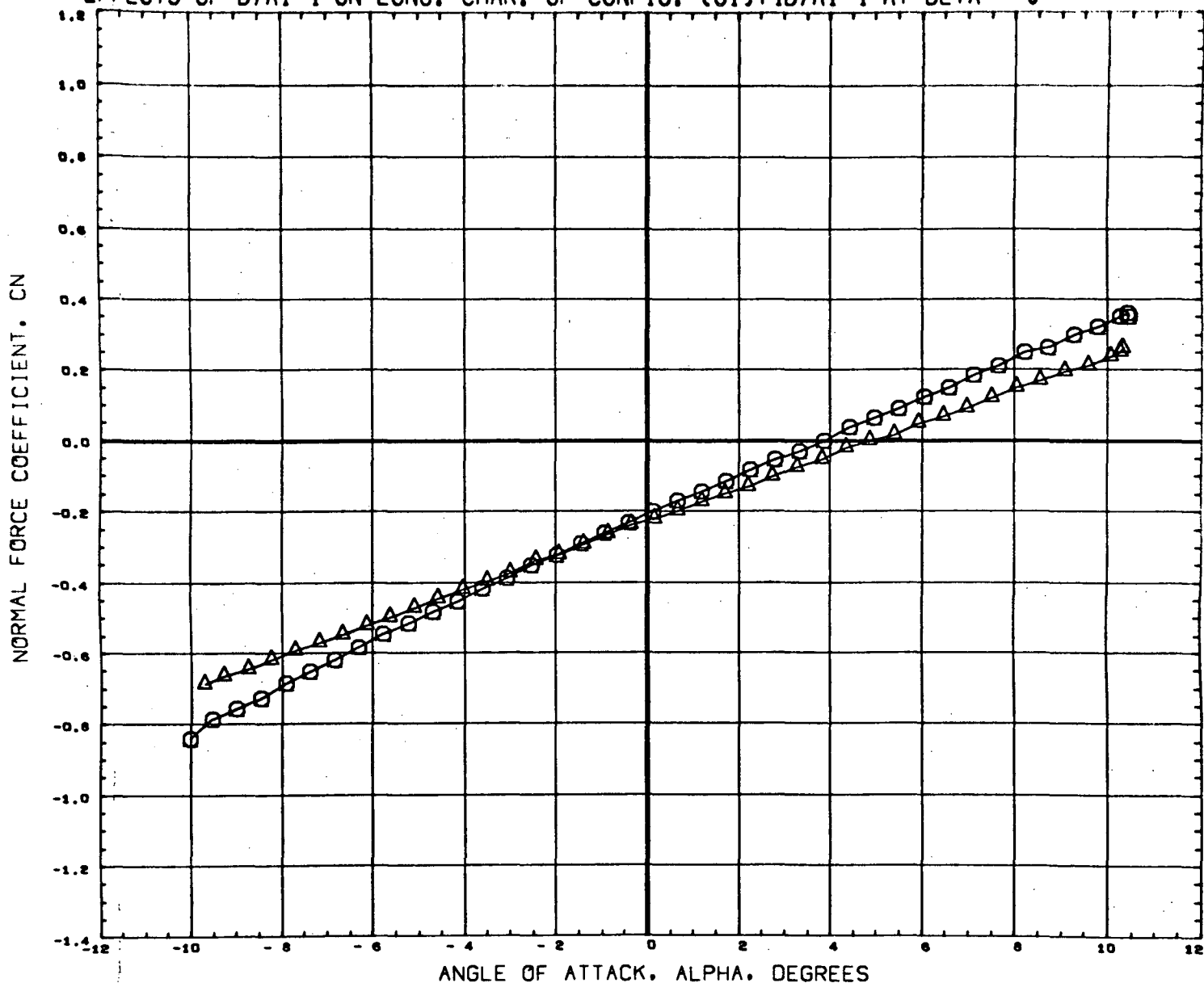
BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH .90

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EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74D9) MDAC S-222 COMPOSITE(T-CG) (01)T4

BETA ELEVTR AILRON RUDDER
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 0.000 0.000 0.000 0.000

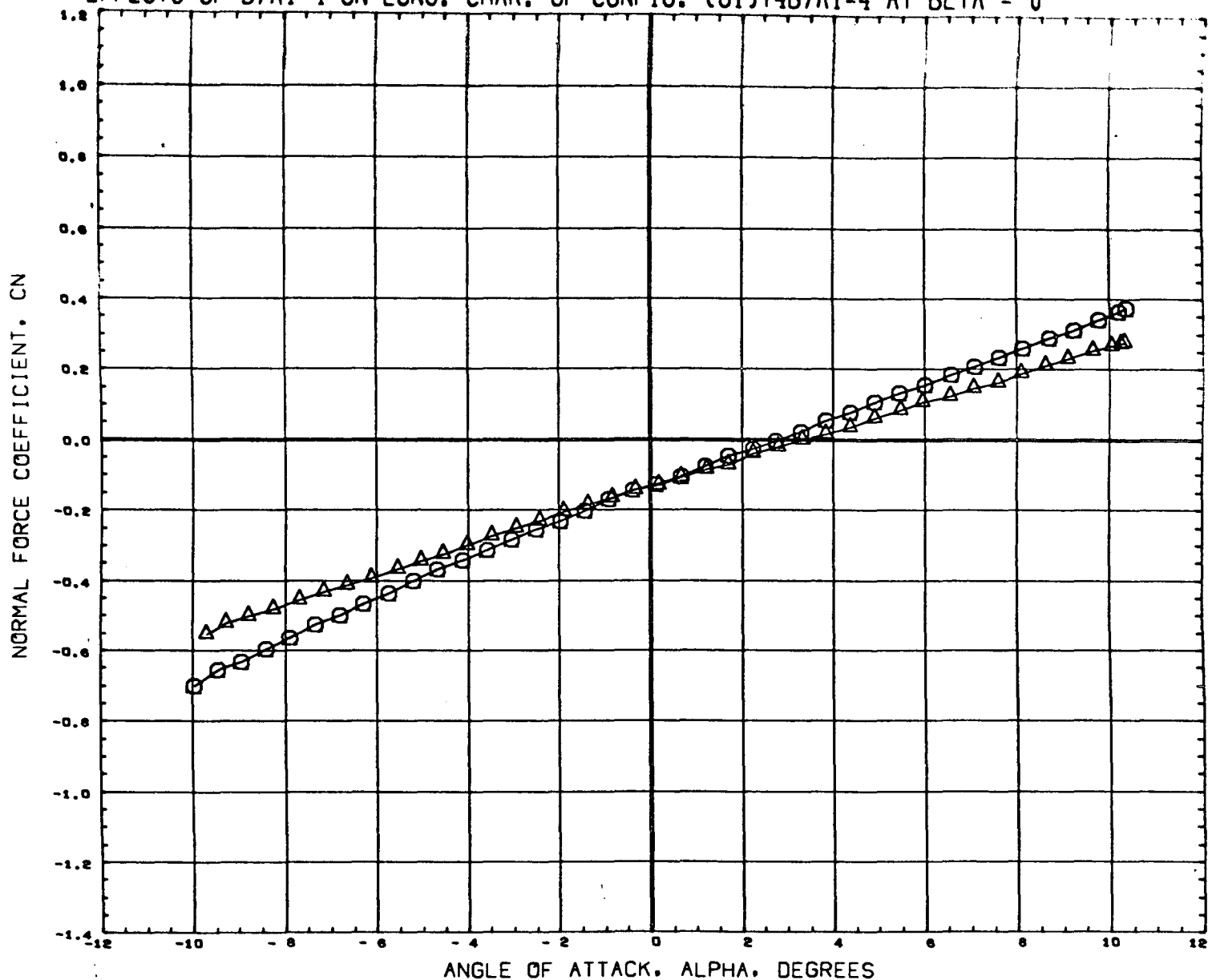
REFERENCE INFORMATION
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 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH

1.08

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EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) (01)T4B7A1-4
 (CD74D9) (01)T4

BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 0.000

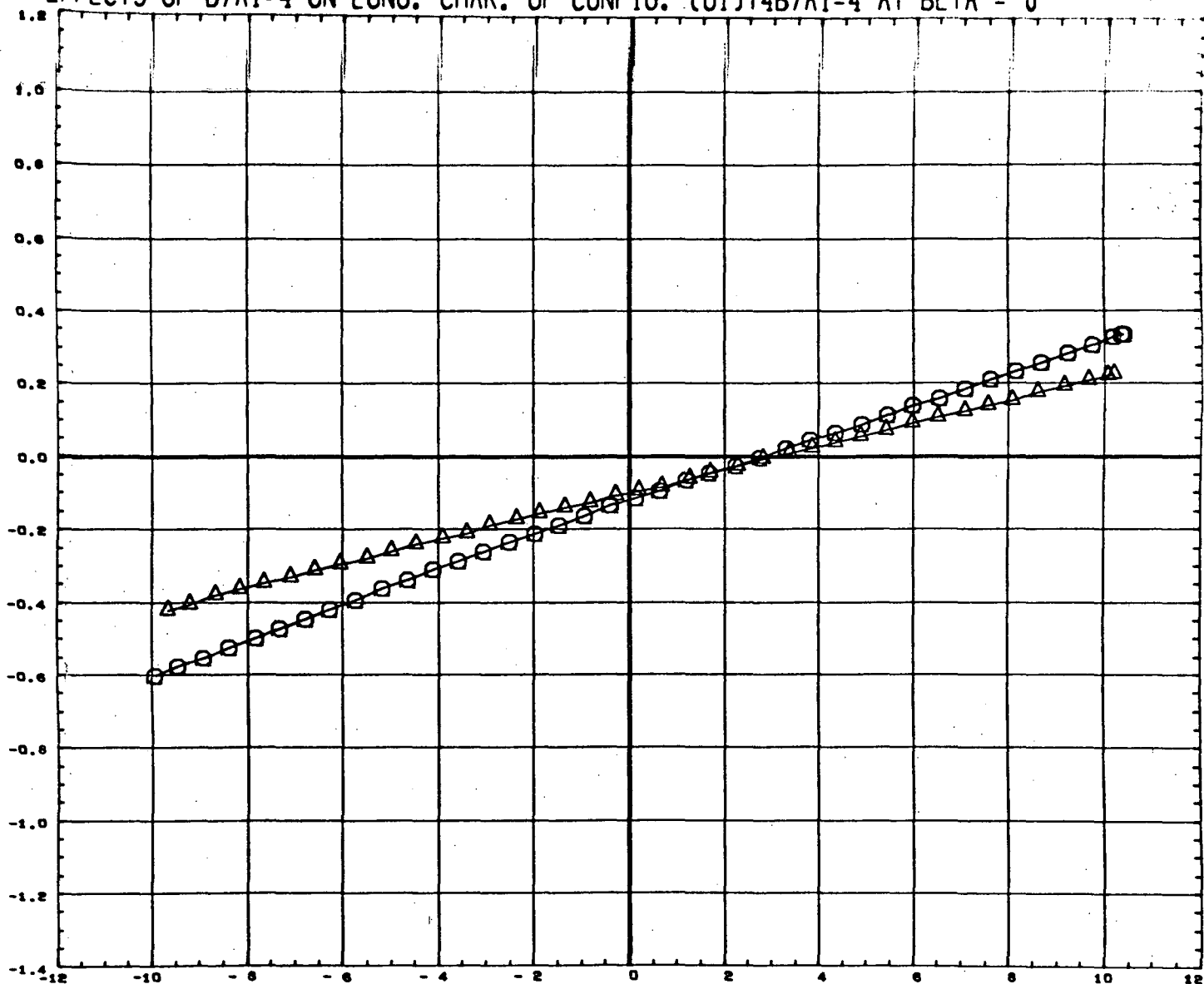
REFERENCE INFORMATION
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 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH 1.51

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EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0

NORMAL FORCE COEFFICIENT, CN



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) (0) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

(CD74D9) (1) MDAC S-222 COMPOSITE (T-CG) (01)T4

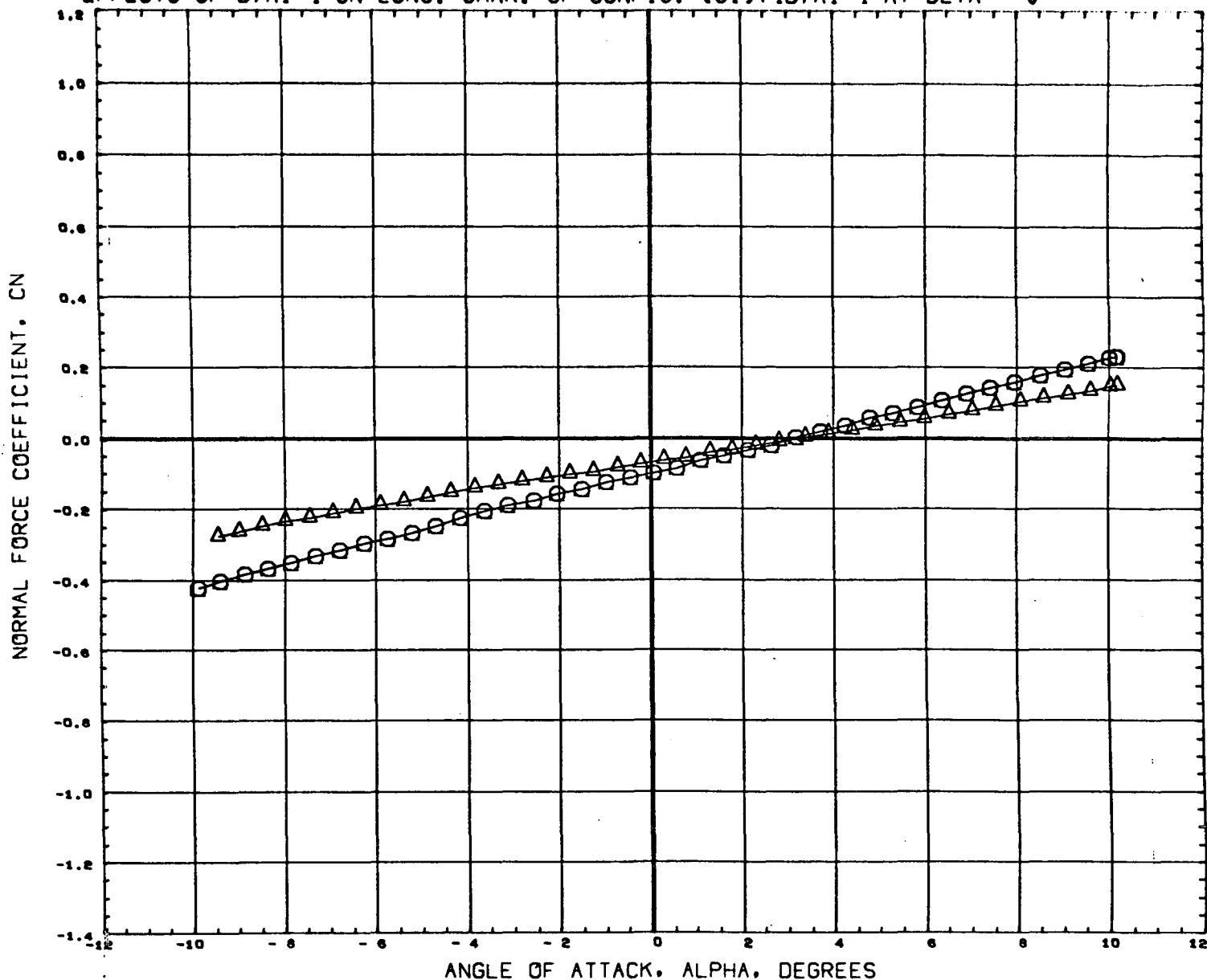
BETA ELEVTR AILRON RUDDER
0.000 0.000 0.000 0.000
0.000 0.000 0.000 0.000

REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060 SCALE

MACH 2.20

PAGE 431

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) ○ MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
 (CD74D9) △ MDAC S-222 COMPOSITE (T-CG) (01)T4

BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 0.000

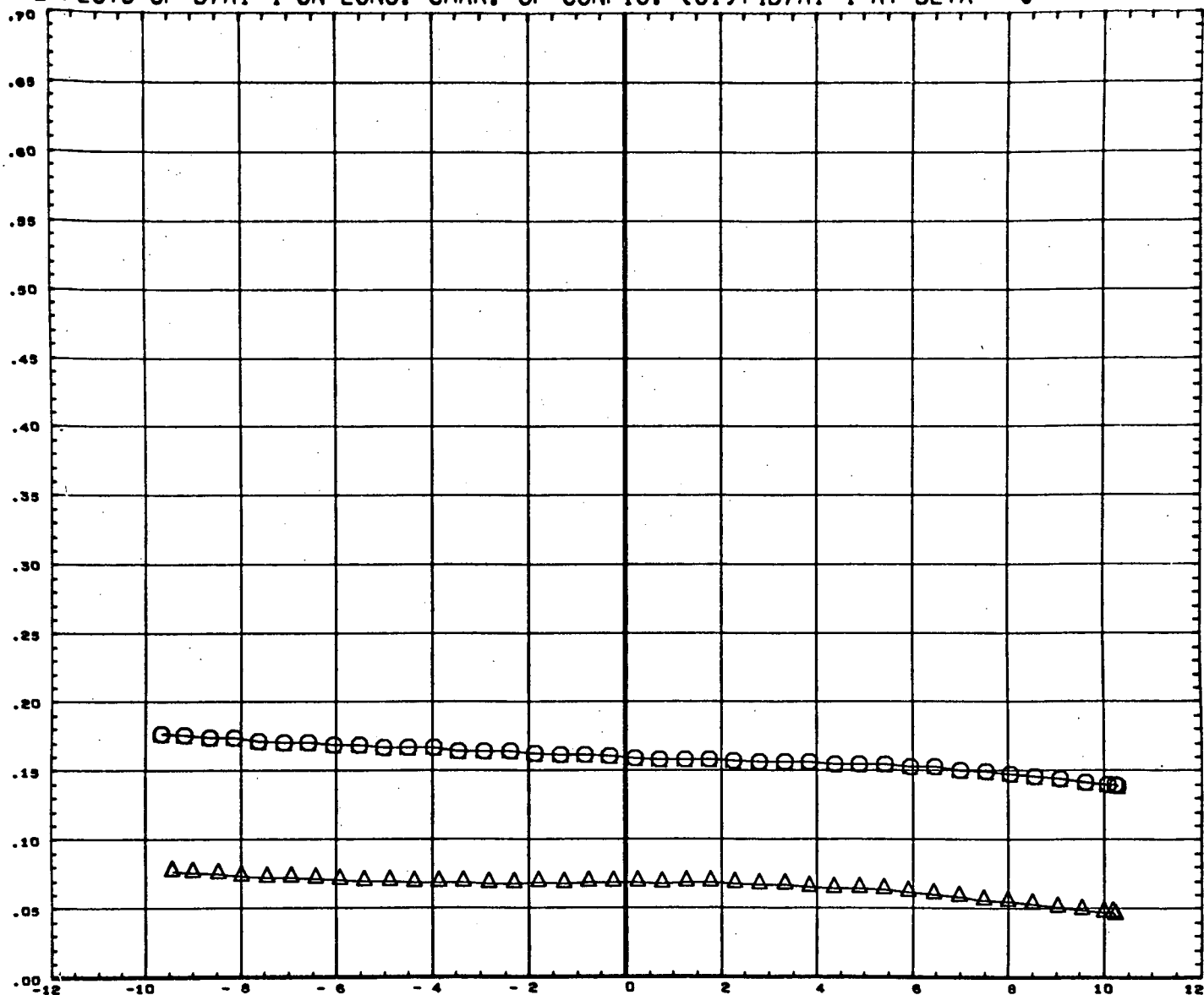
REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BRFP 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH 4.47

PAGE 432

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0

AXIAL FORCE COEFFICIENT, CA

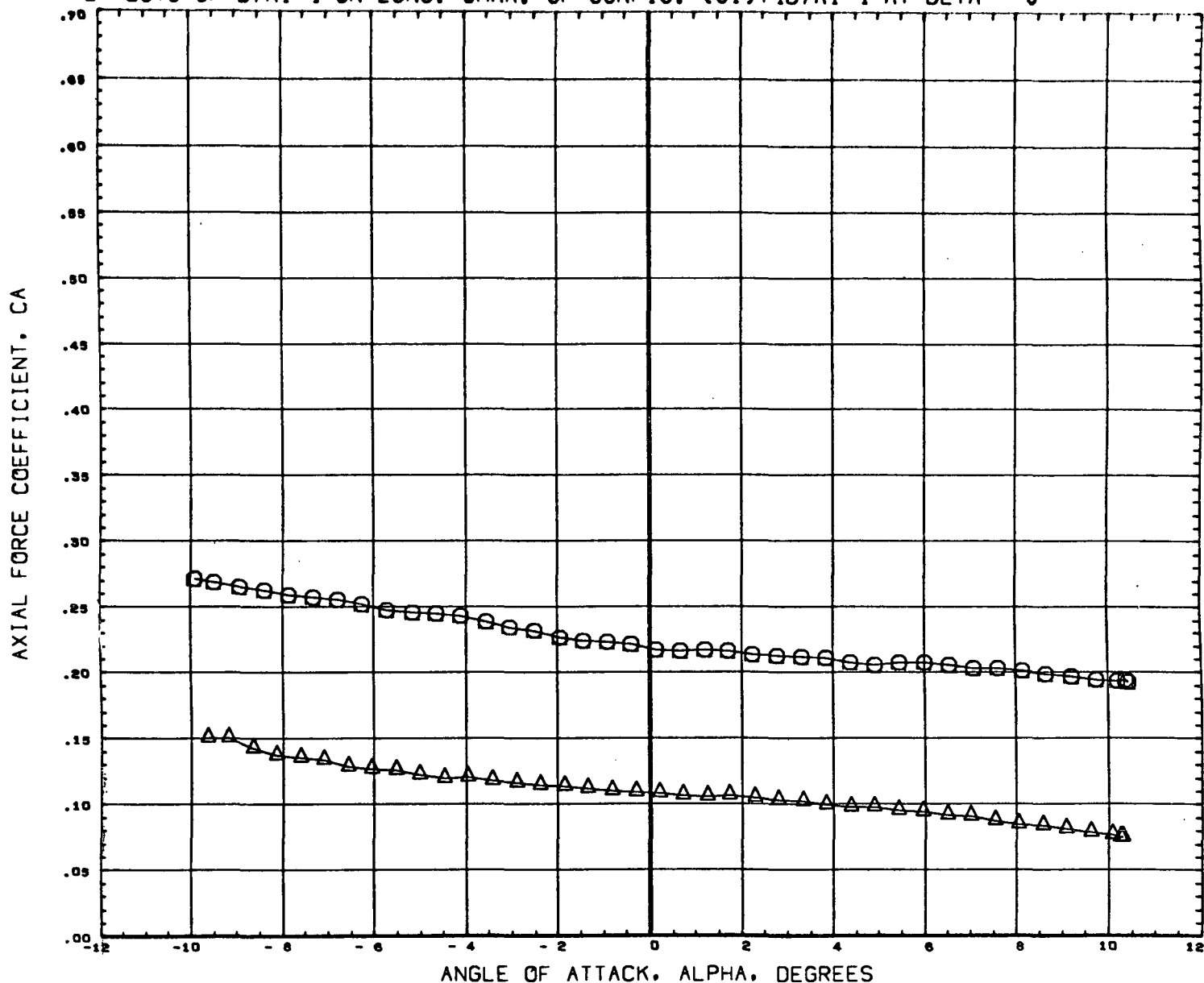


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D9) | MDAC S-222 COMPOSITE (T-CG) (01)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRF | 557.0004 IN. |
| | | | | | | YMRF | 0.0000 IN. |
| | | | | | | ZMRF | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

PAGE 433

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (O1)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4
 (CD74D9) MDAC S-222 COMPOSITE(T-CG) (O1)T4

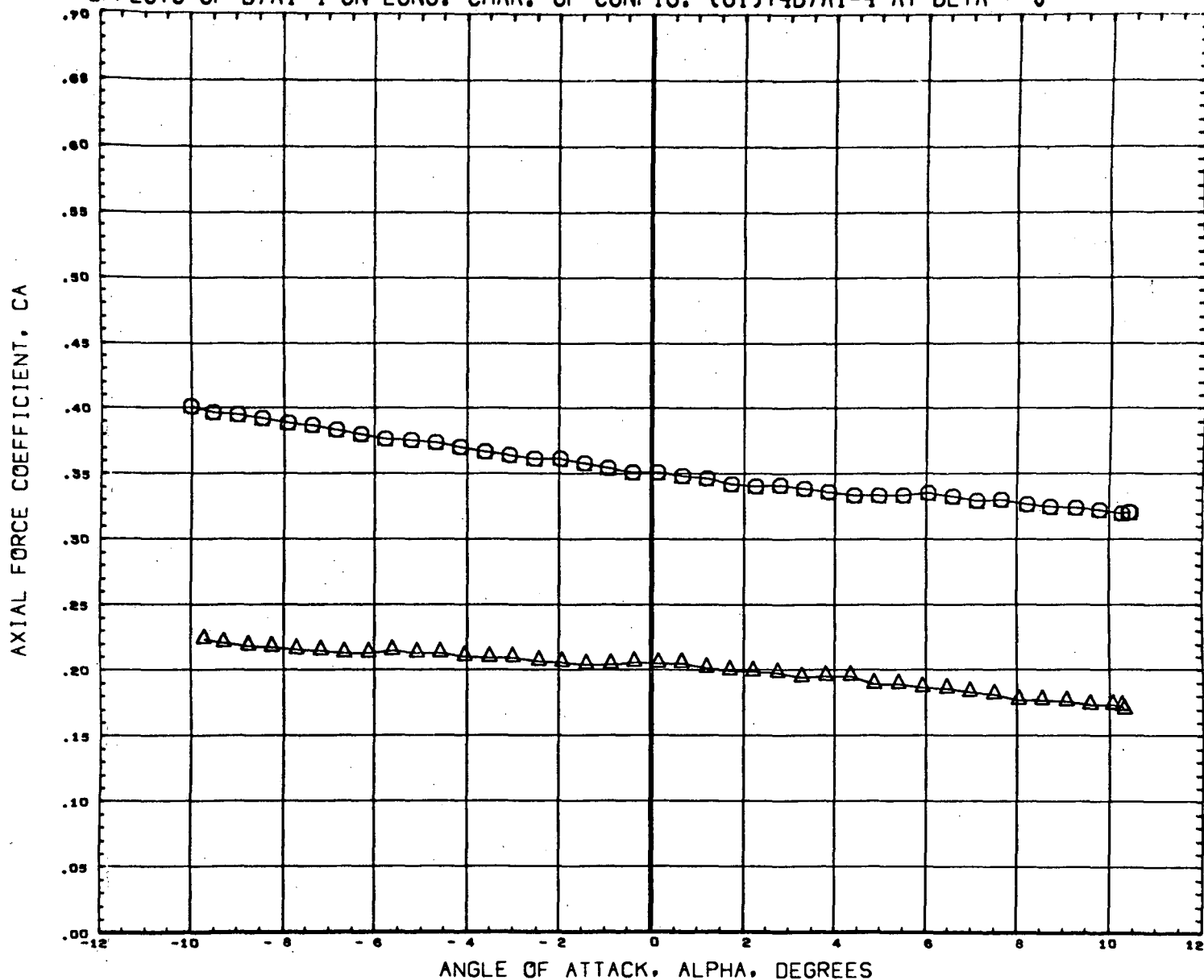
BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.3004 IN.
 BREF 682.0004 IN.
 XMRP 957.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH .90

PAGE 434

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (O1)T4B7A1-4 AT BETA = 0



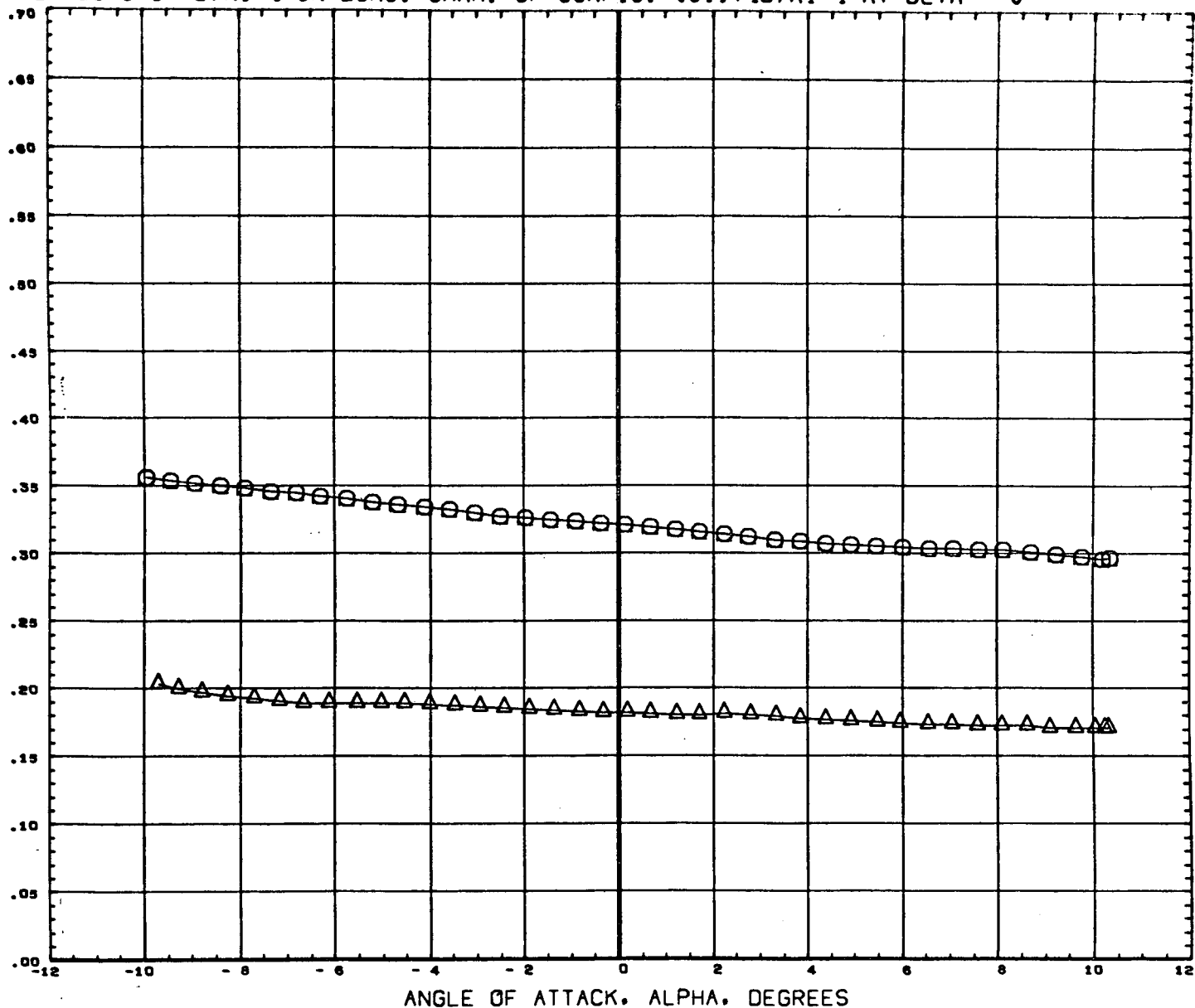
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D9) | MDAC S-222 COMPOSITE(T-CG) (O1)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 957.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

PAGE 435

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0

AXIAL FORCE COEFFICIENT, CA



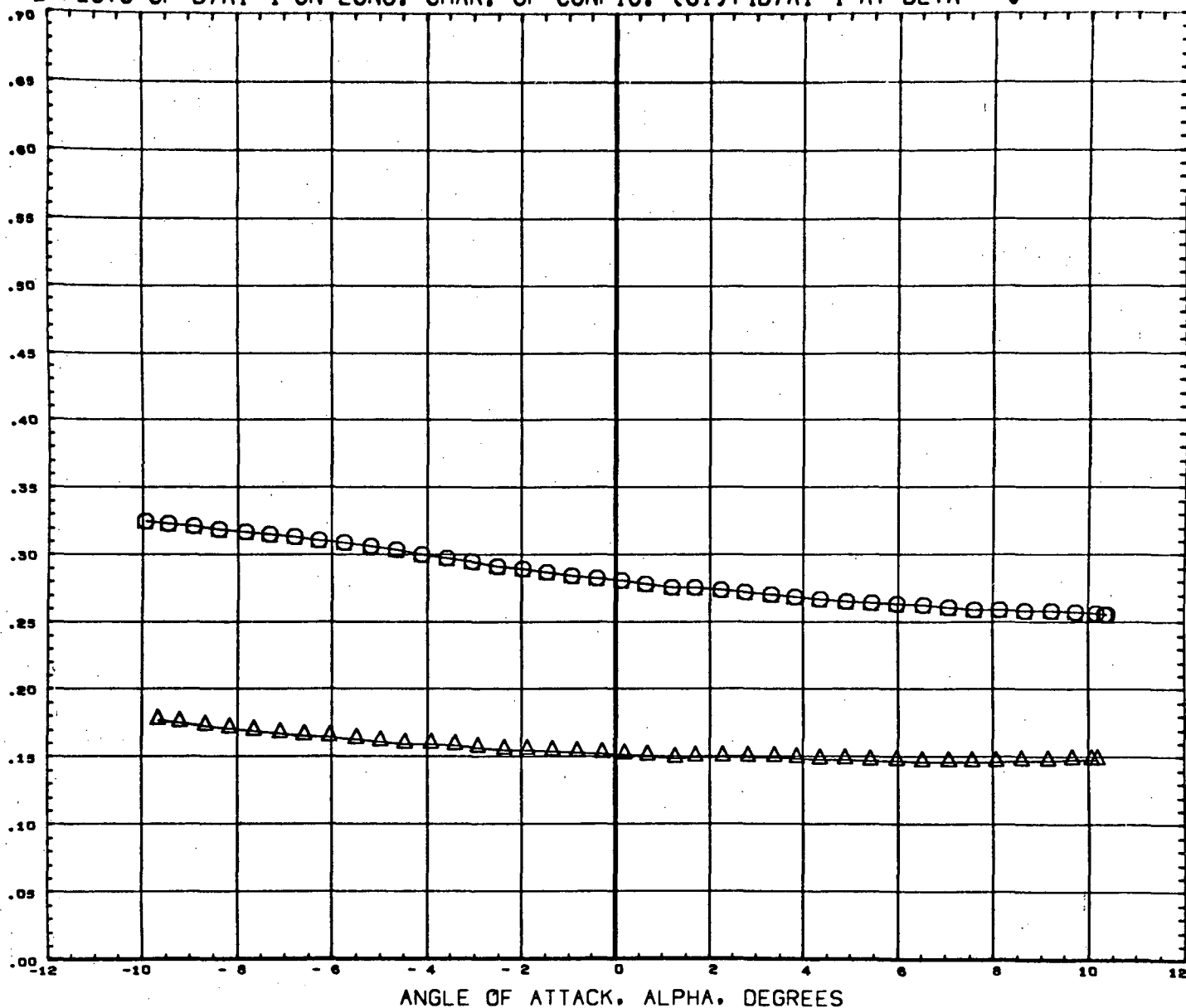
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D9) | MDAC S-222 COMPOSITE(T-CG) (01)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.51

PAGE 436

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (O1)T4B7A1-4 AT BETA = 0

AXIAL FORCE COEFFICIENT, CA



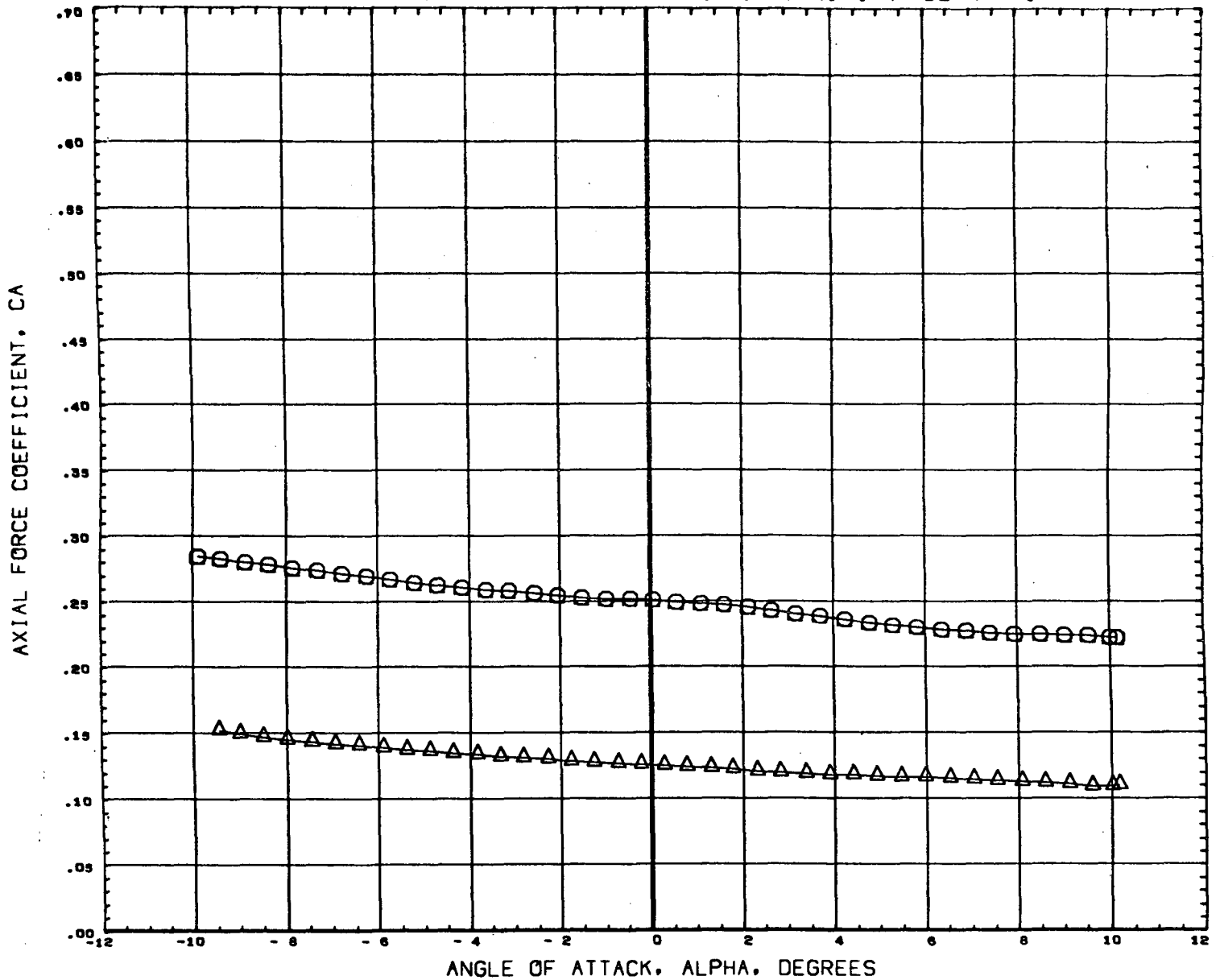
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 |
| (CD74D9) | MDAC S-222 COMPOSITE(T-CG) (O1)T4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 862.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH 2.20

PAGE 437

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74D9) MDAC S-222 COMPOSITE(T-CG) (01)T4

BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 0.000

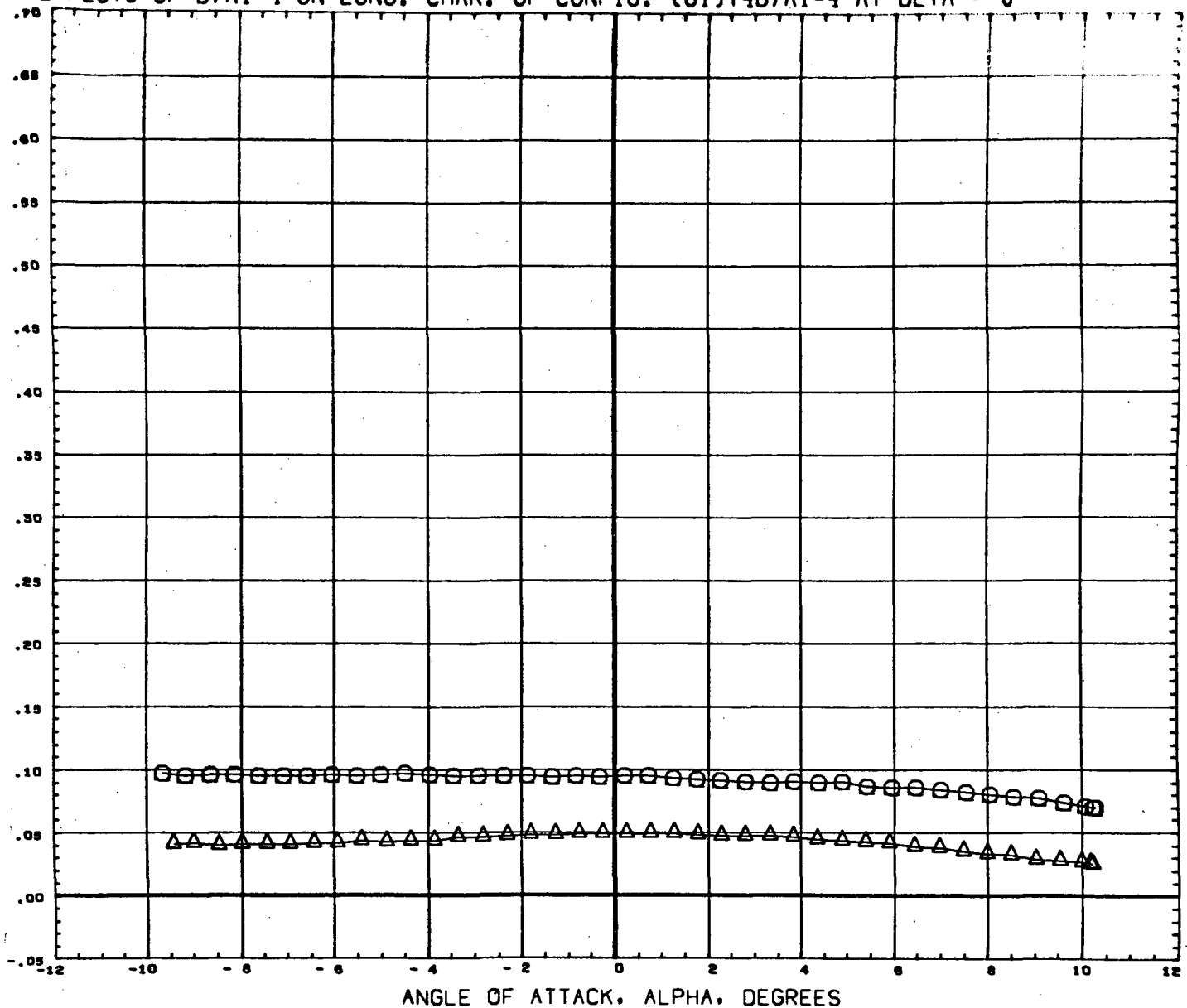
REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH 4.47

PAGE 438

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



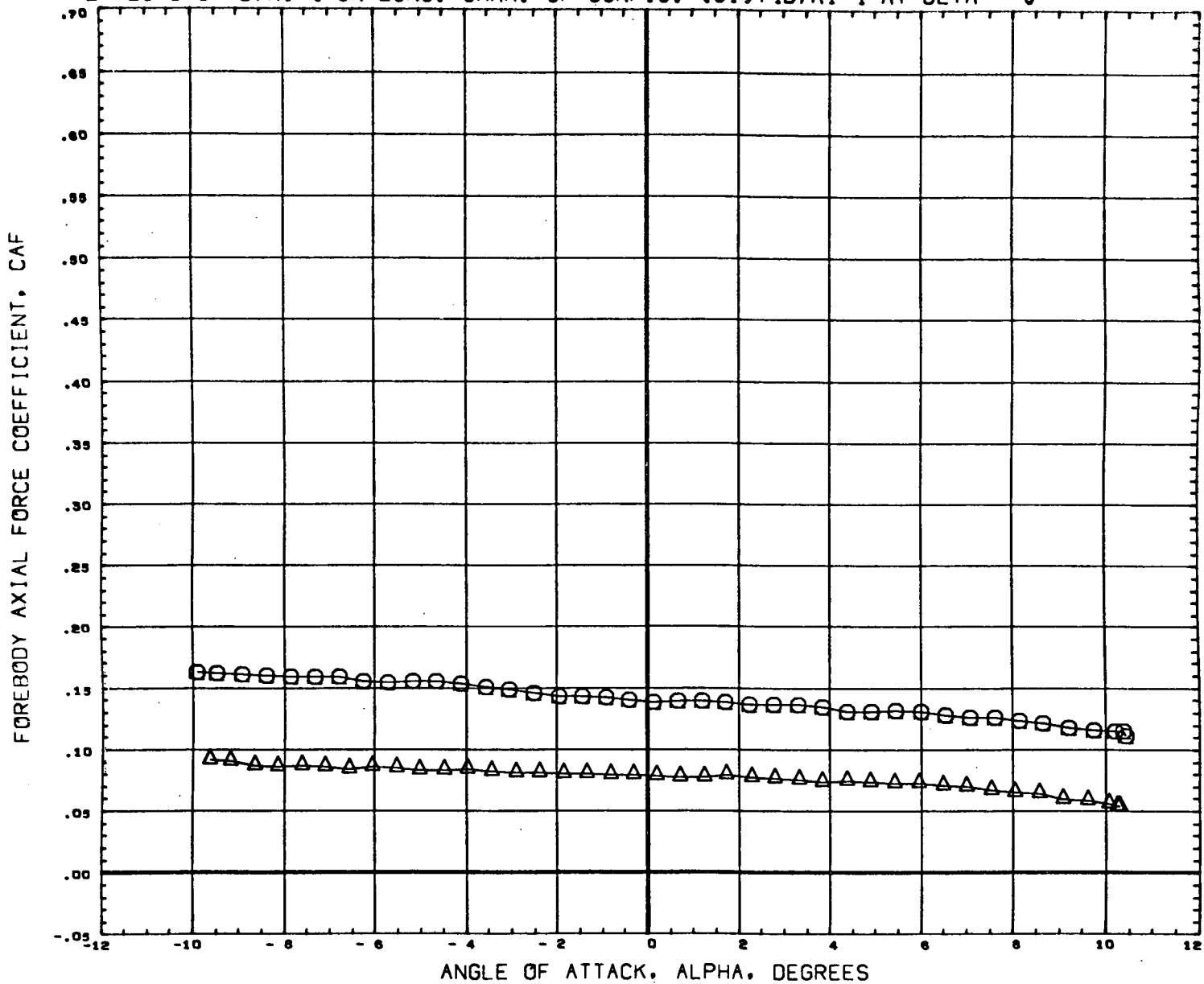
DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74D9) MDAC S-222 COMPOSITE(T-CG) (01)T4

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 682.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH .58

PAGE 439

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (C074C7) (01)T4B7A1-4
 (C074D9) (01)T4

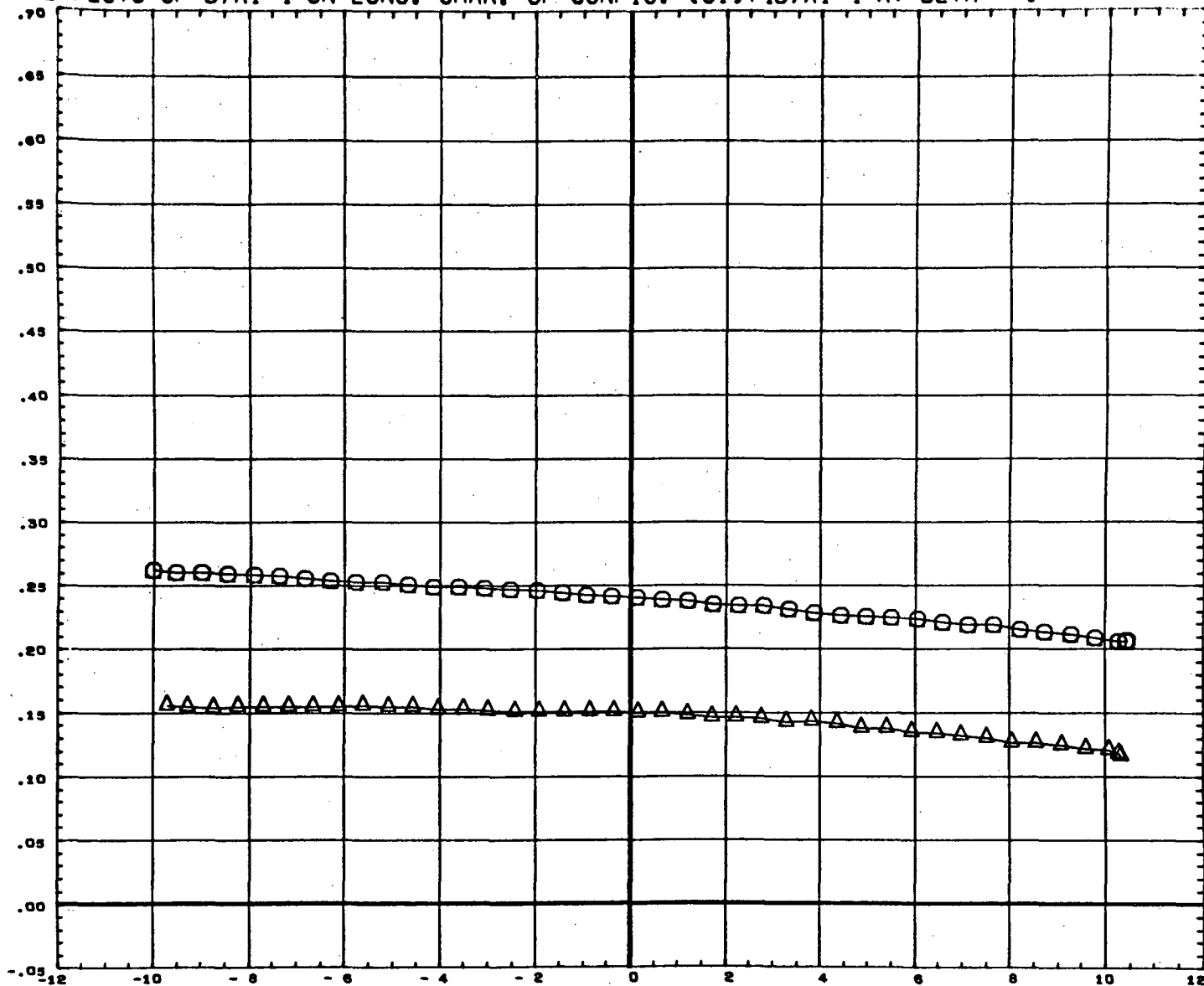
| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH .90

PAGE 440

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF

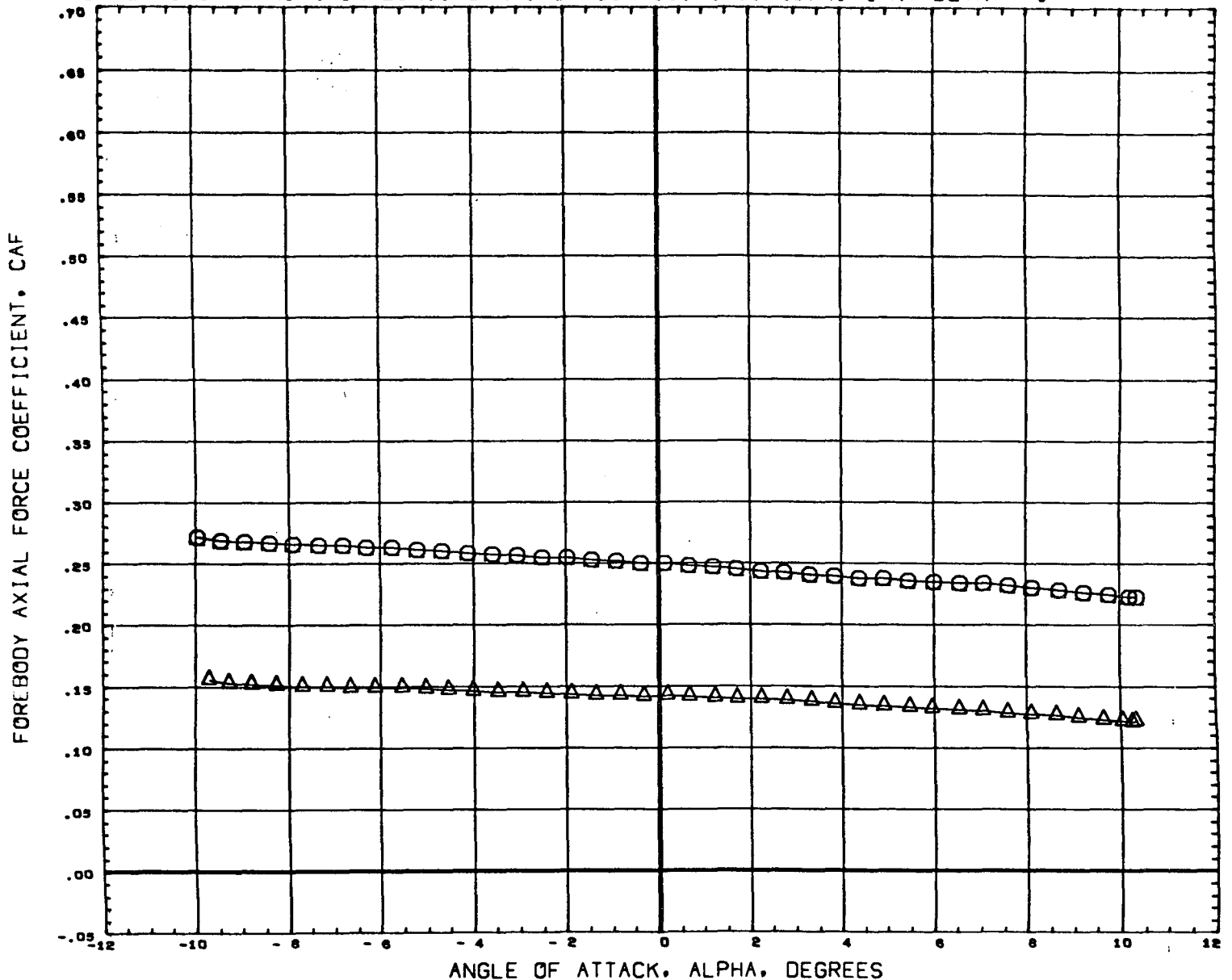


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | NDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D9) | NDAC S-222 COMPOSITE(T-CG) (01)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

PAGE 441

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0



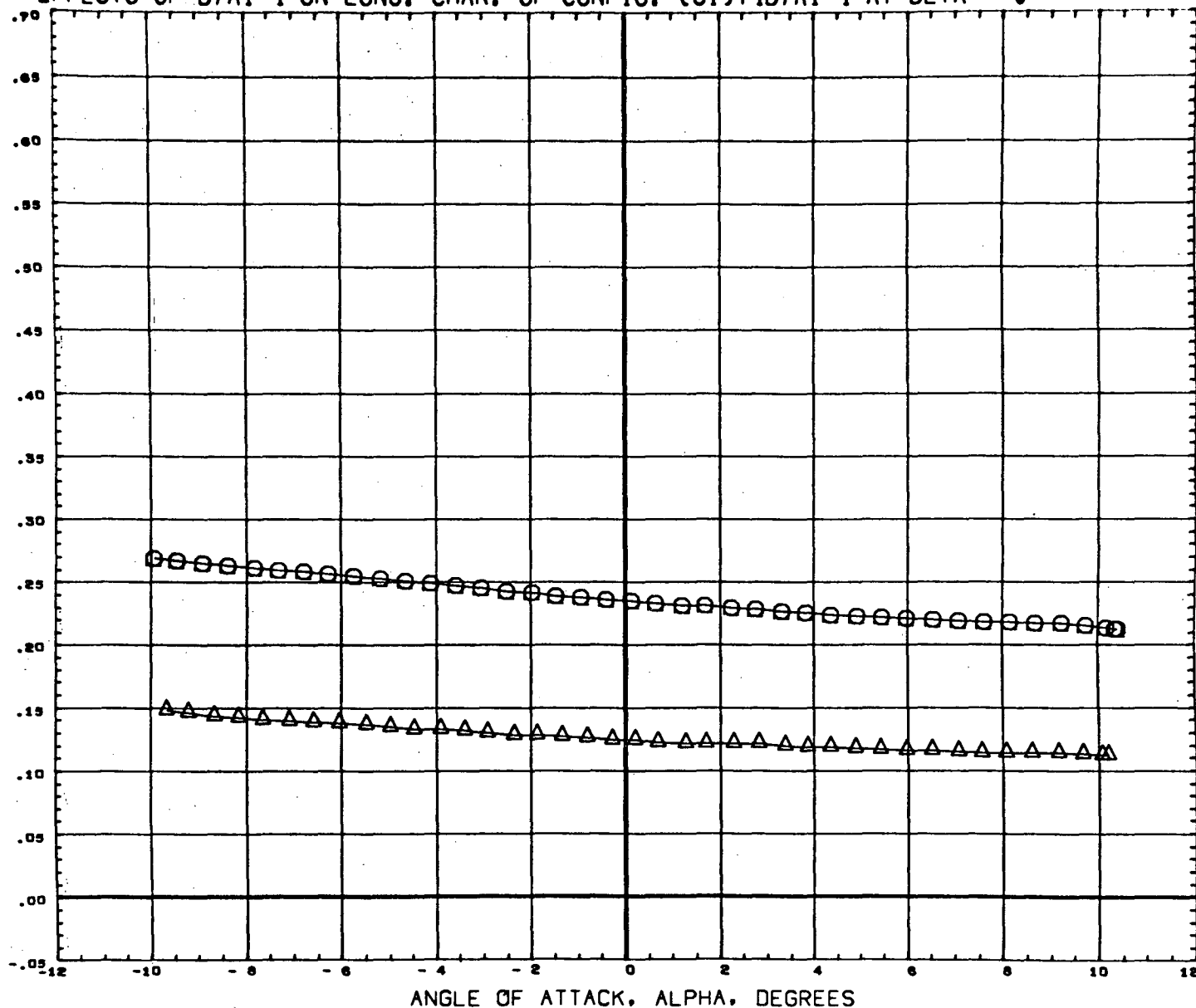
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D9) | MDAC S-222 COMPOSITE (T-CG) (01)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.51

PAGE 442

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
 (CD74D9) MDAC S-222 COMPOSITE (T-CG) (01)T4

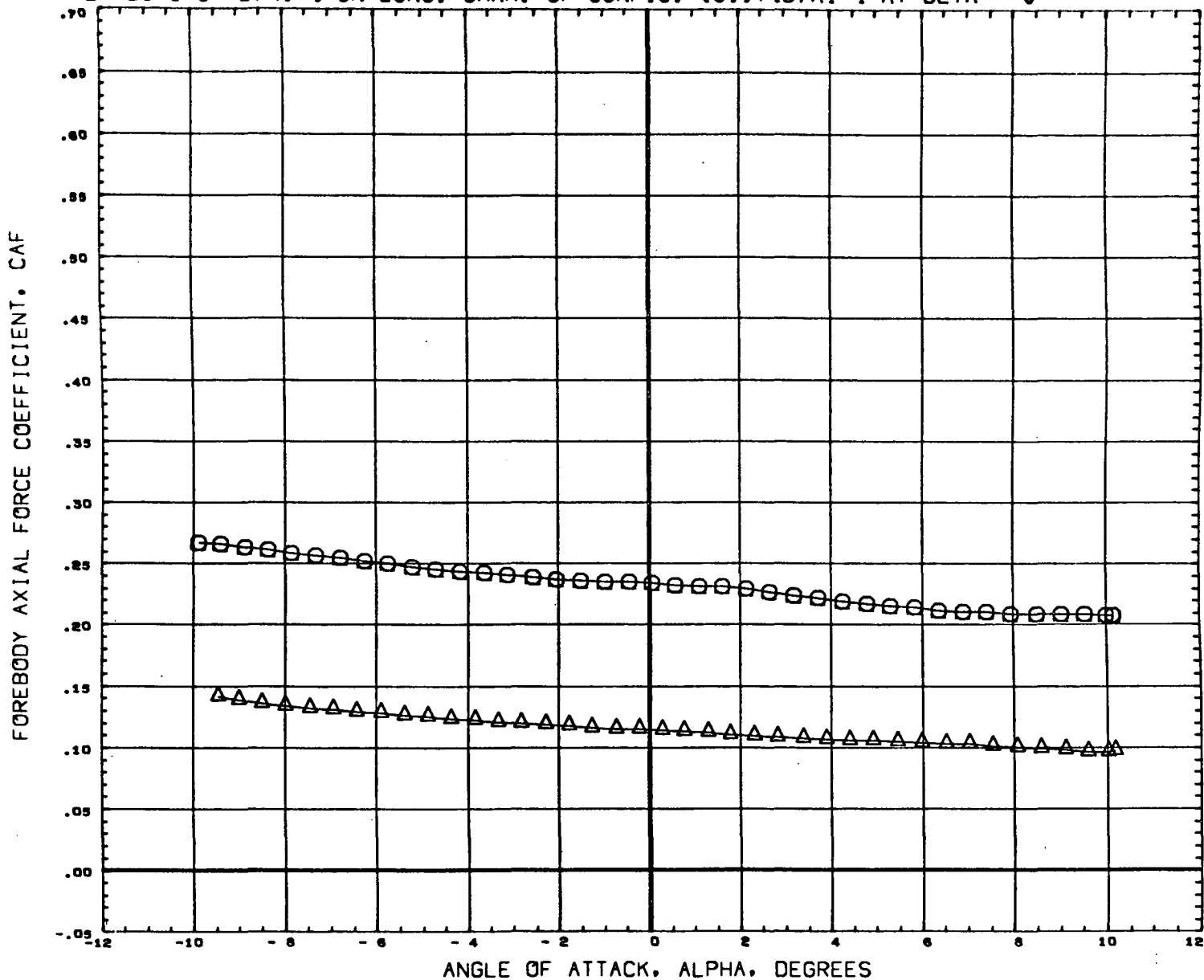
BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ. FT.
 LREF 609.5004 IN.
 BREF 862.0004 IN.
 XMRF 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH 2.20

PAGE 443

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0



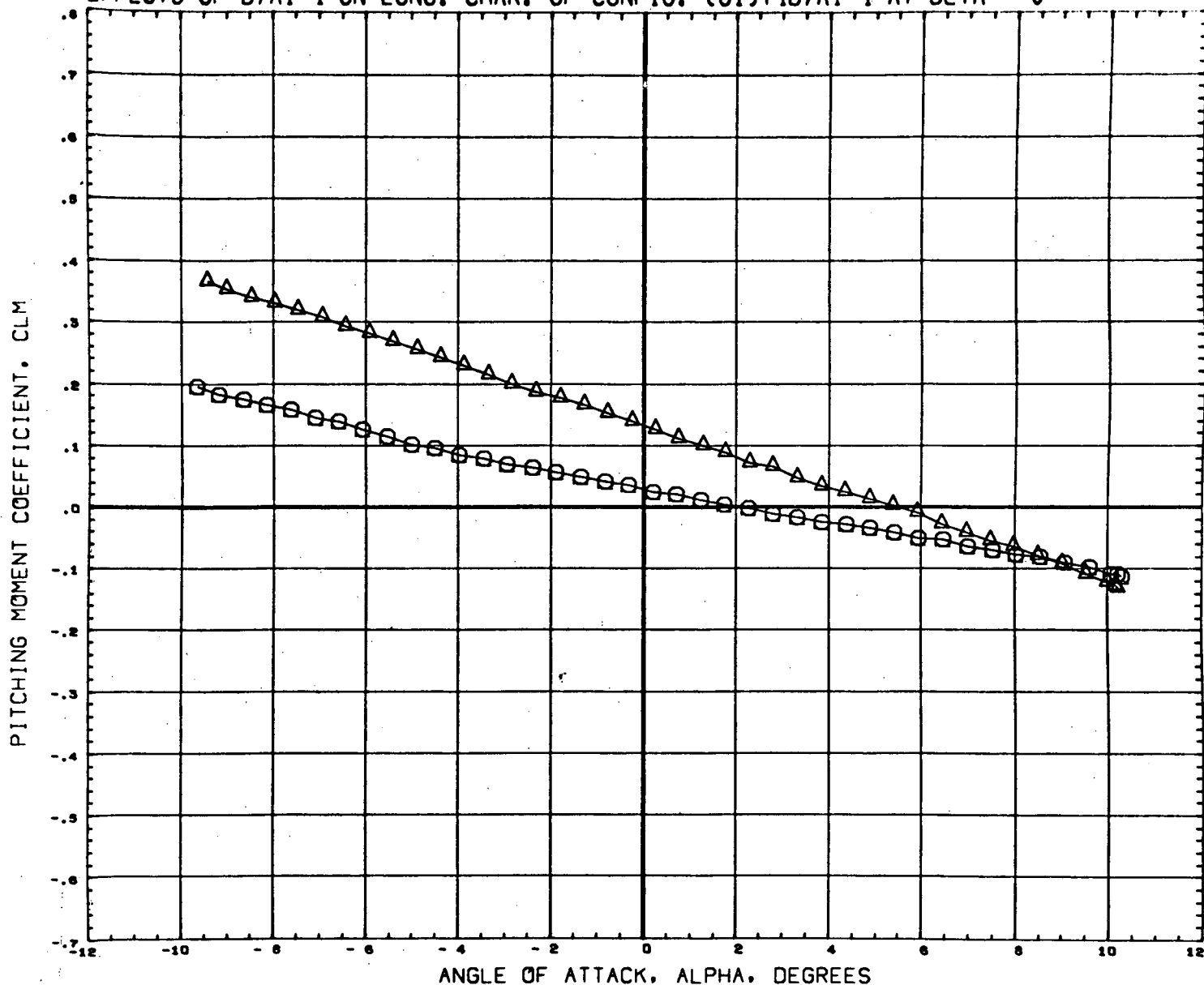
DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74D9) MDAC S-222 COMPOSITE(T-CG) (01)T4

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 4.47

PAGE 444

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (O1)T4B7A1-4 AT BETA = 0

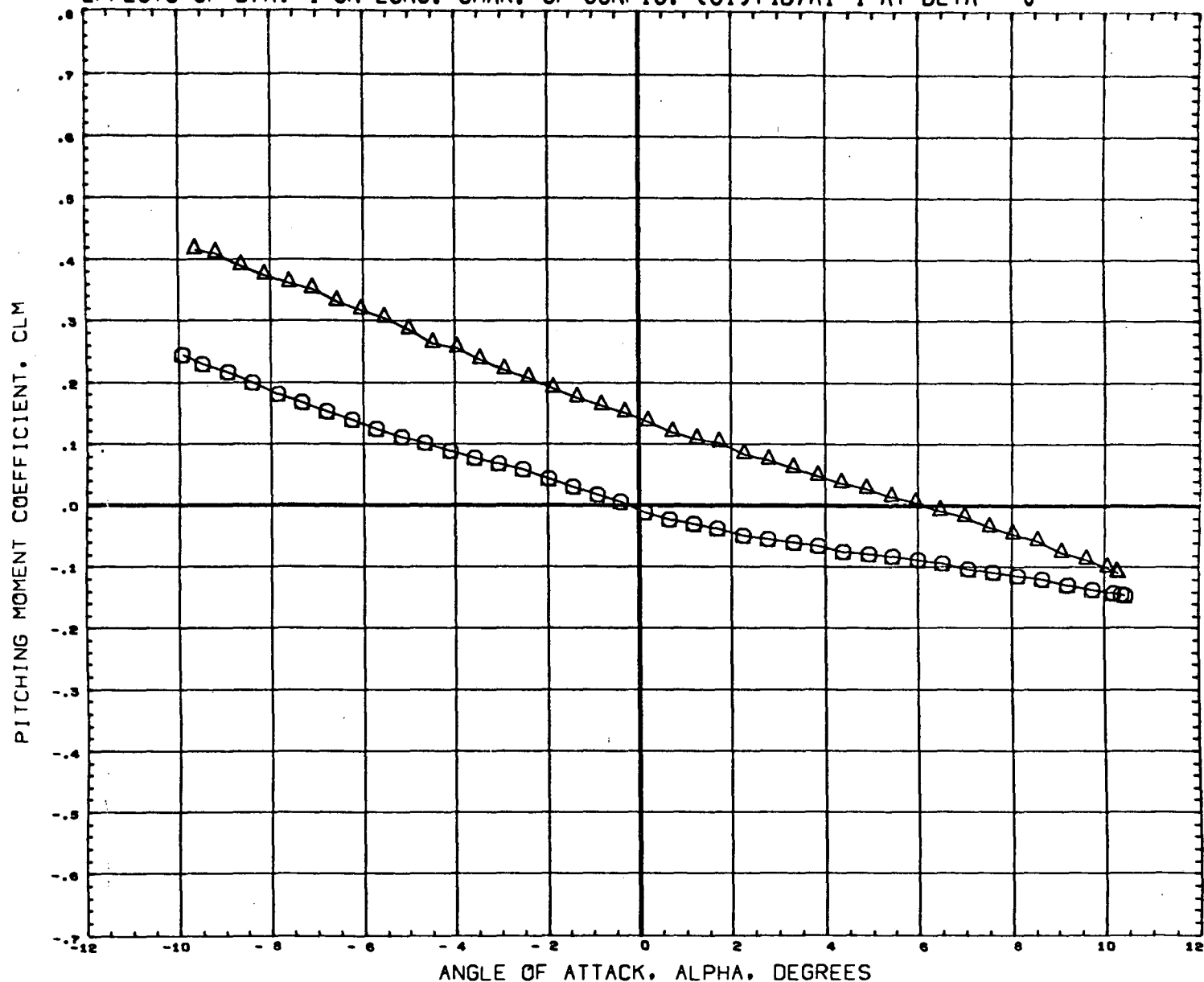


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D9) | MDAC S-222 COMPOSITE(T-CG) (O1)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 997.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |



MACH .58

PAGE 445

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (O1)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7)  MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4
(CD74D9)  MDAC S-222 COMPOSITE (T-CG) (O1)T4

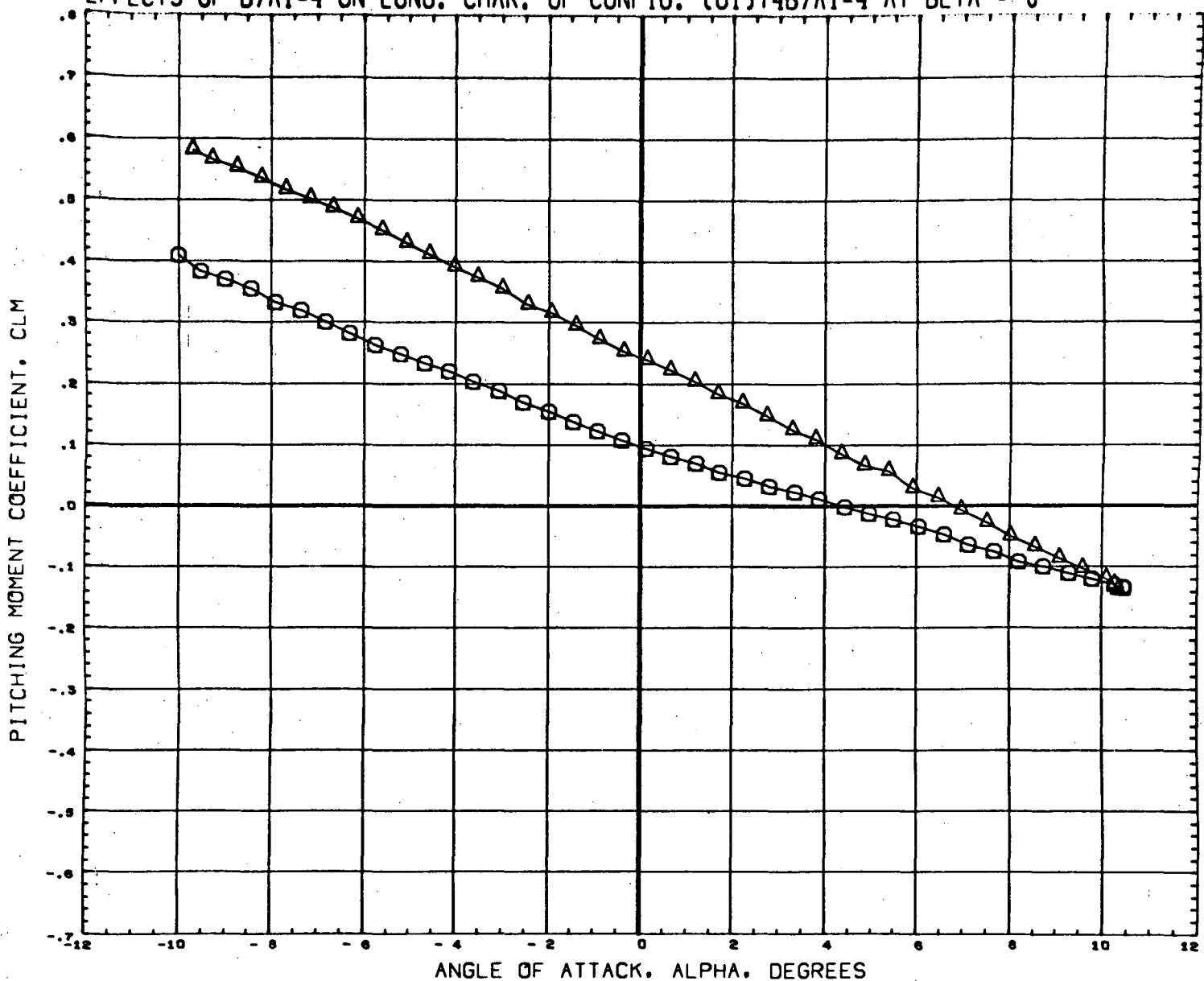
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 537.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0080 | SCALE |

MACH .90

PAGE 446

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0



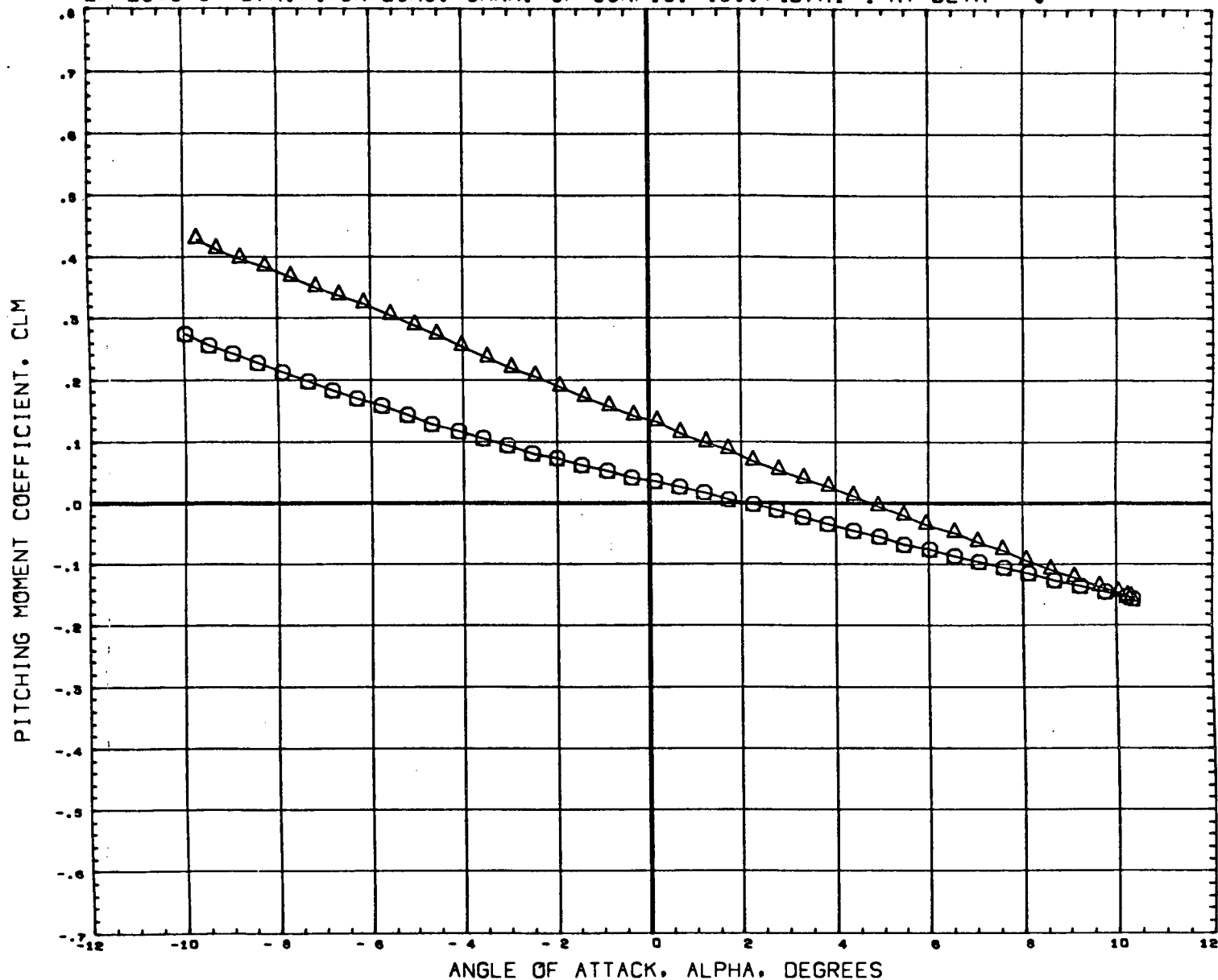
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (CD74D9) | MDAC S-222 COMPOSITE (T-CG) (01)T4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 1.08

PAGE 447

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D9) | MDAC S-222 COMPOSITE(T-CG) (01)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

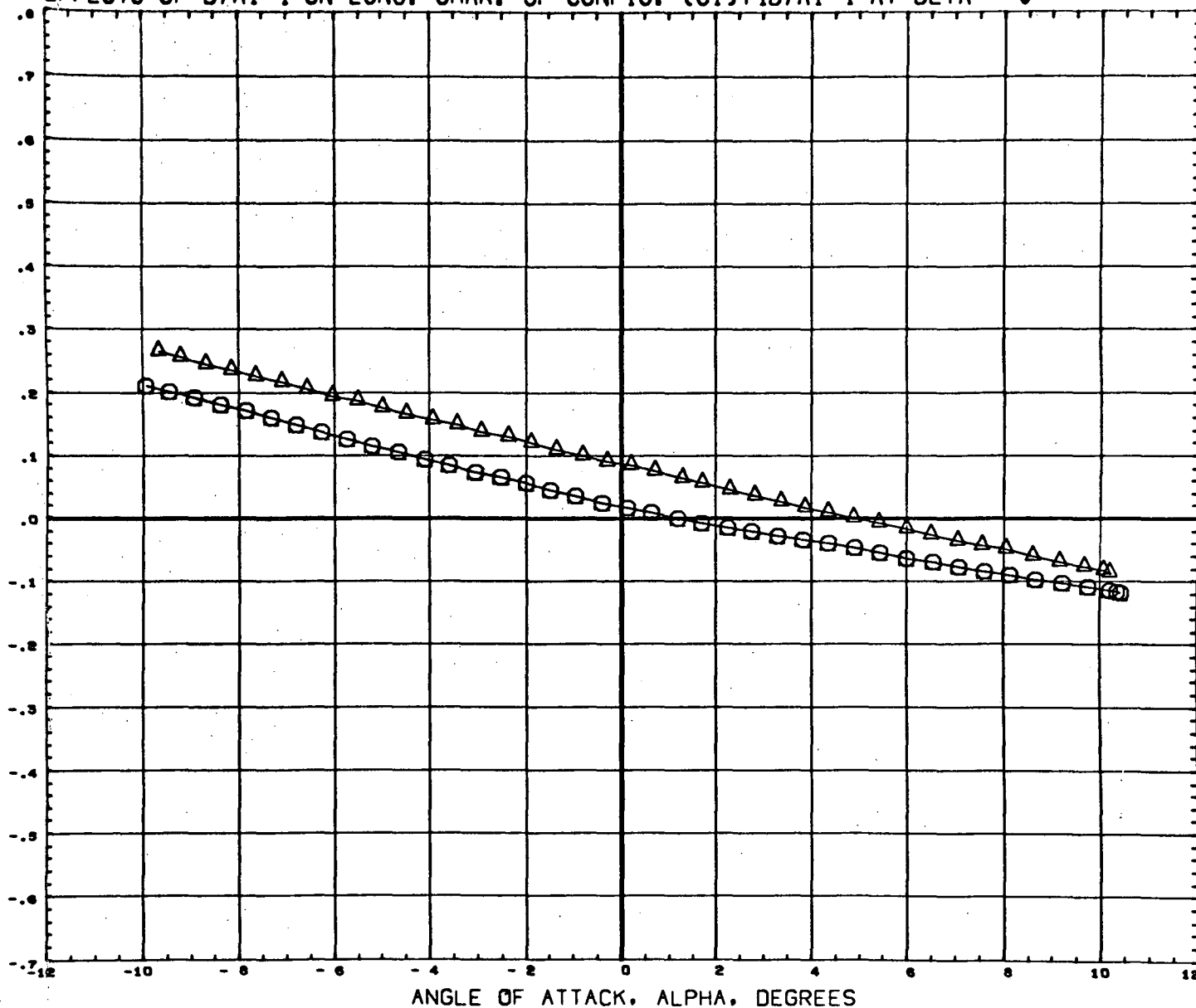
MACH

1.51

PAGE 448

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0

PITCHING MOMENT COEFFICIENT, CLM



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
 (CD74D9) MDAC S-222 COMPOSITE (T-CG) (01)T4

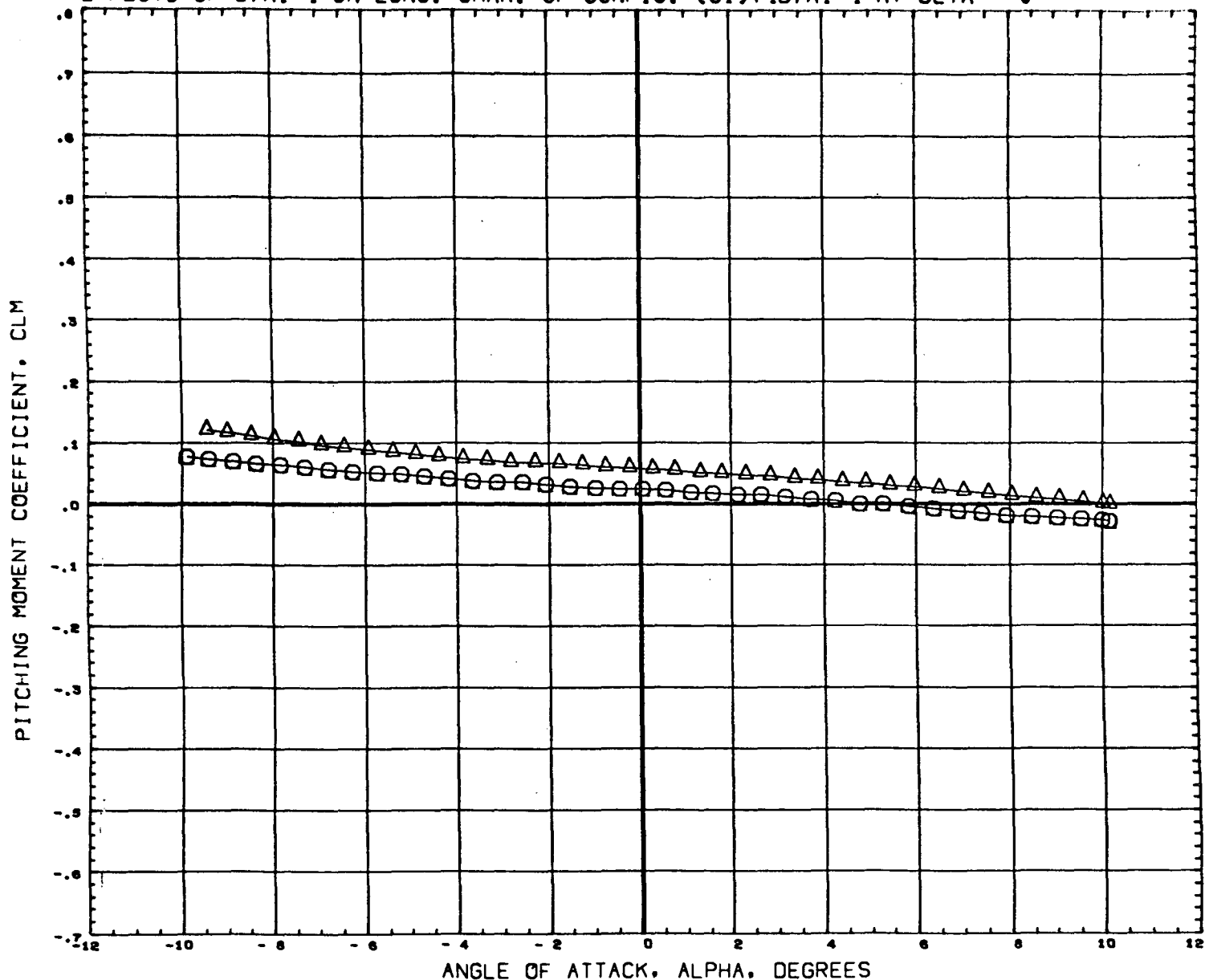
| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|-------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ. FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.9004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH

2.20

PAGE 449

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0



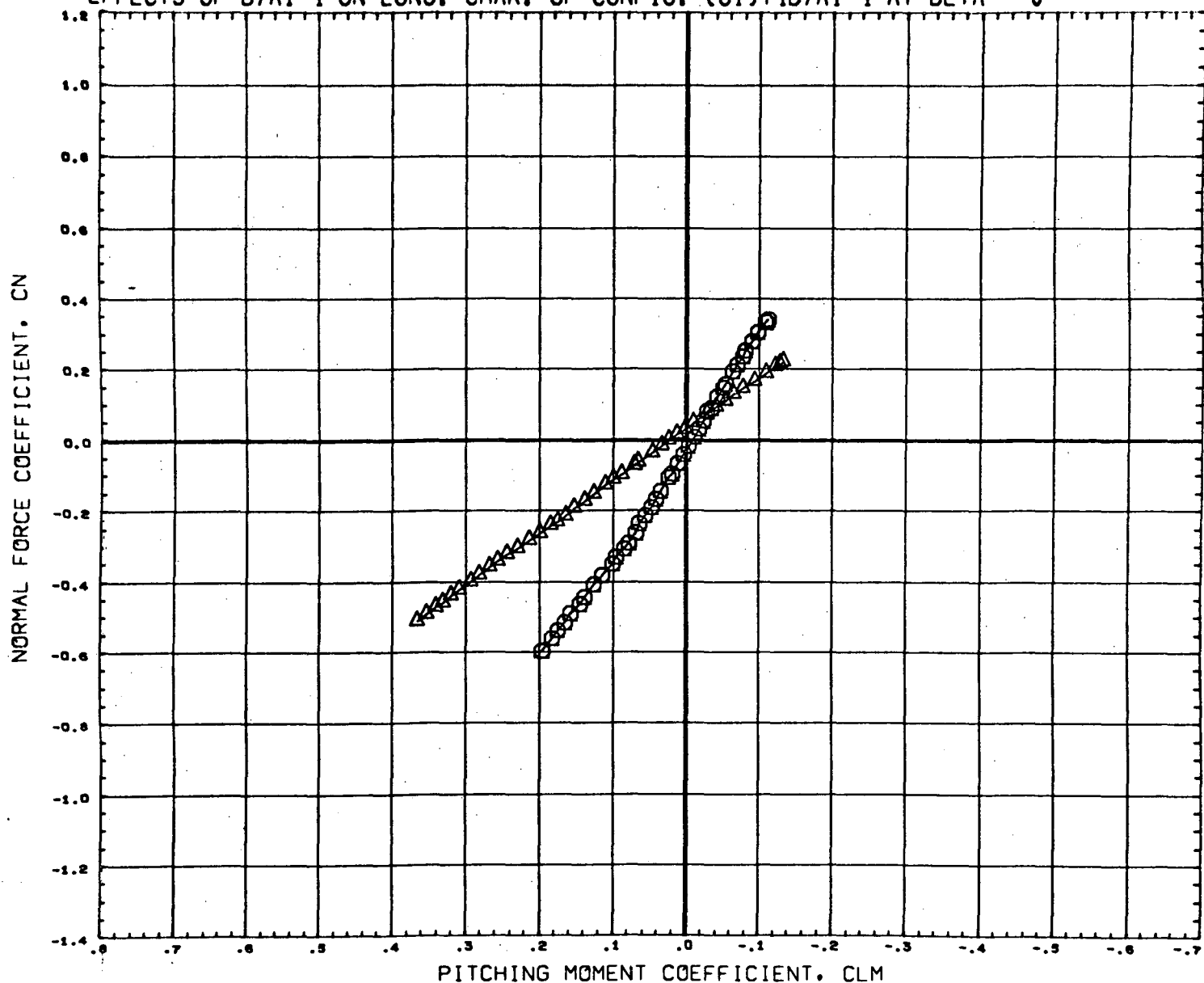
DATA SET SYMBOL CONFIGURATION DESCRIPTION
(CD74C7) ○ MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
(CD74D9) △ MDAC S-222 COMPOSITE(T-CG) (01)T4

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 809.9004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 4.47

PAGE 450

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (O1)T4B7A1-4 AT BETA = 0



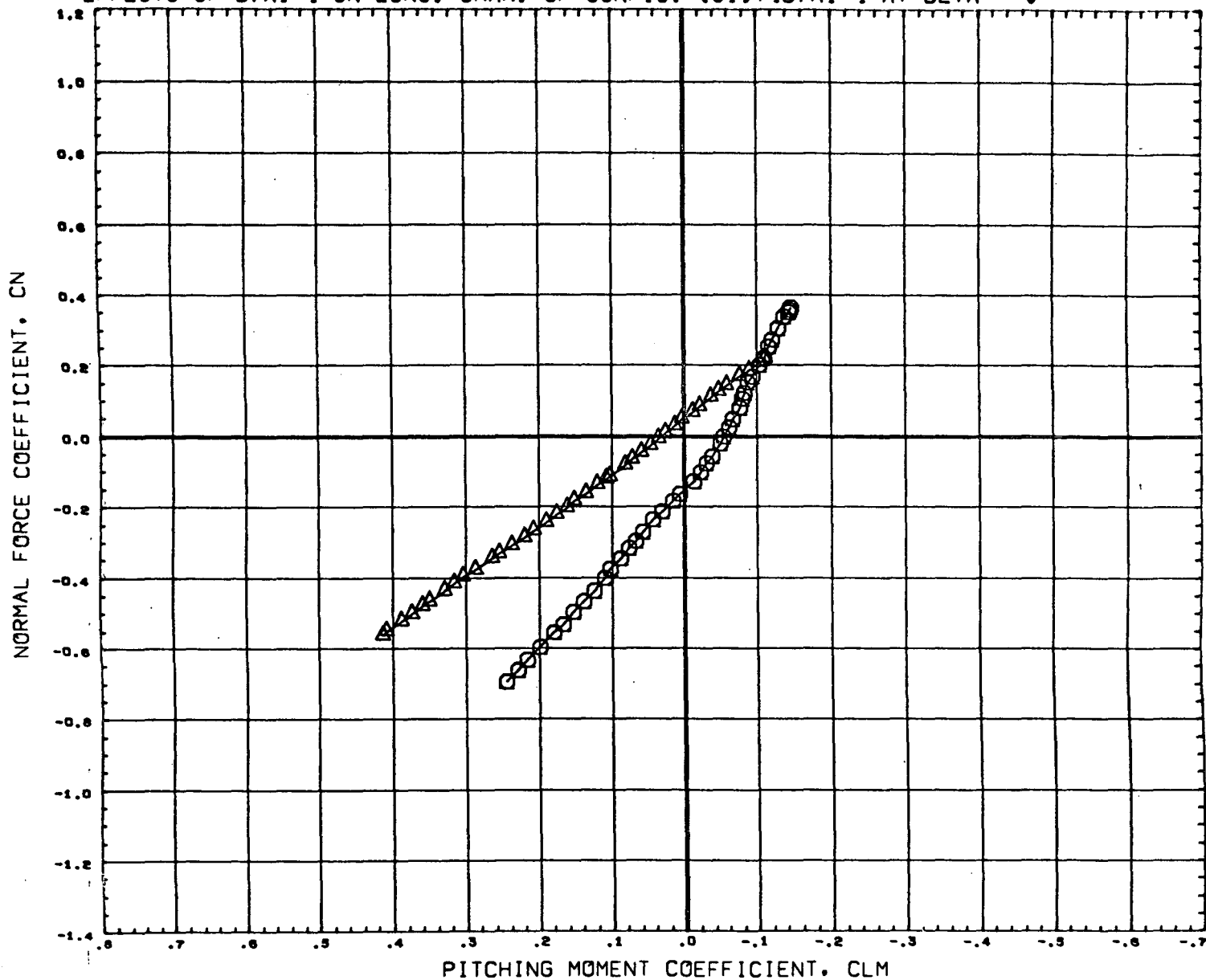
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 |
| (CD74D9) | MDAC S-222 COMPOSITE(T-CG) (O1)T4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 682.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH .58

PAGE 451

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0

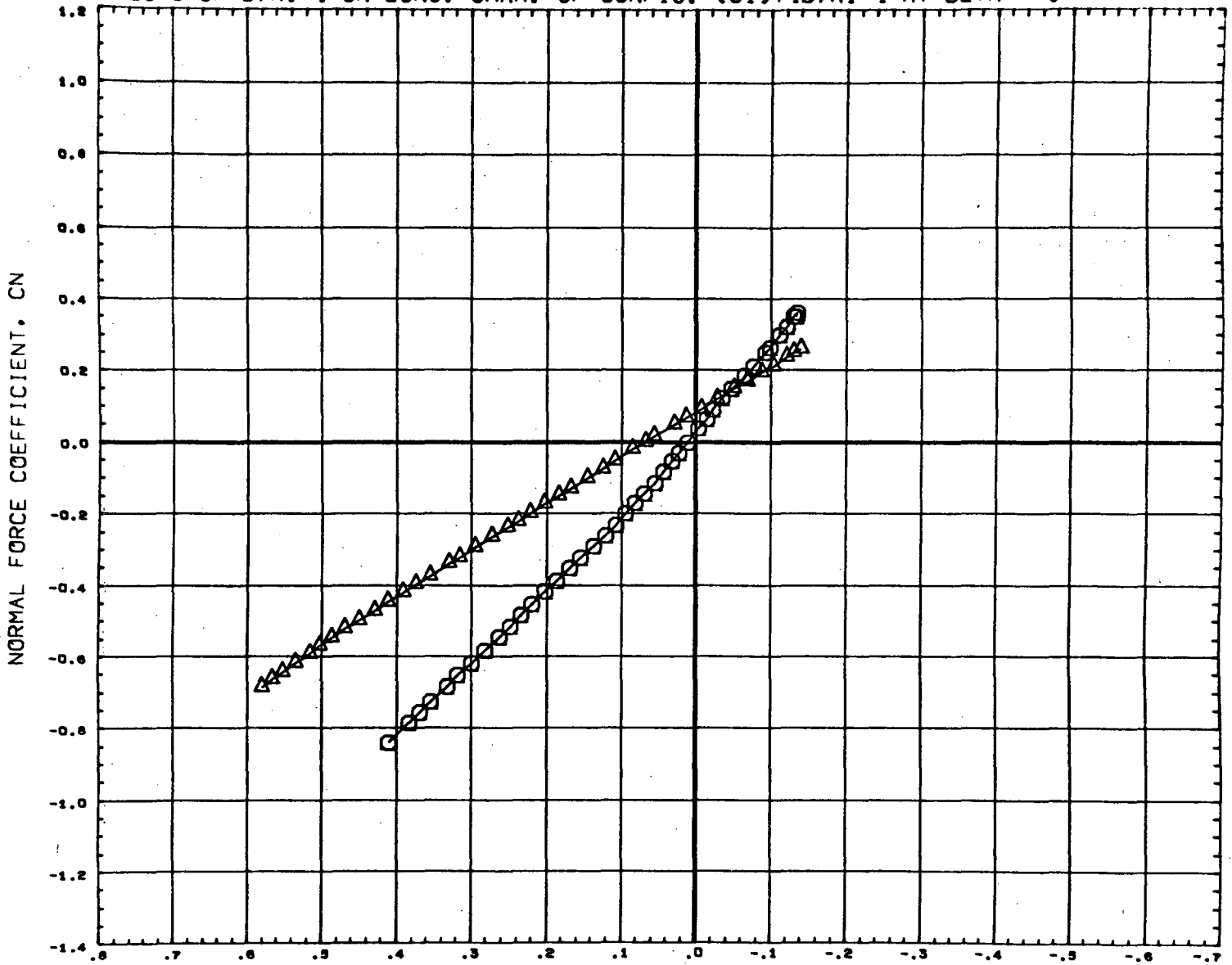


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D9) | MDAC S-222 COMPOSITE(T-CG) (01)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

PAGE 452

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0



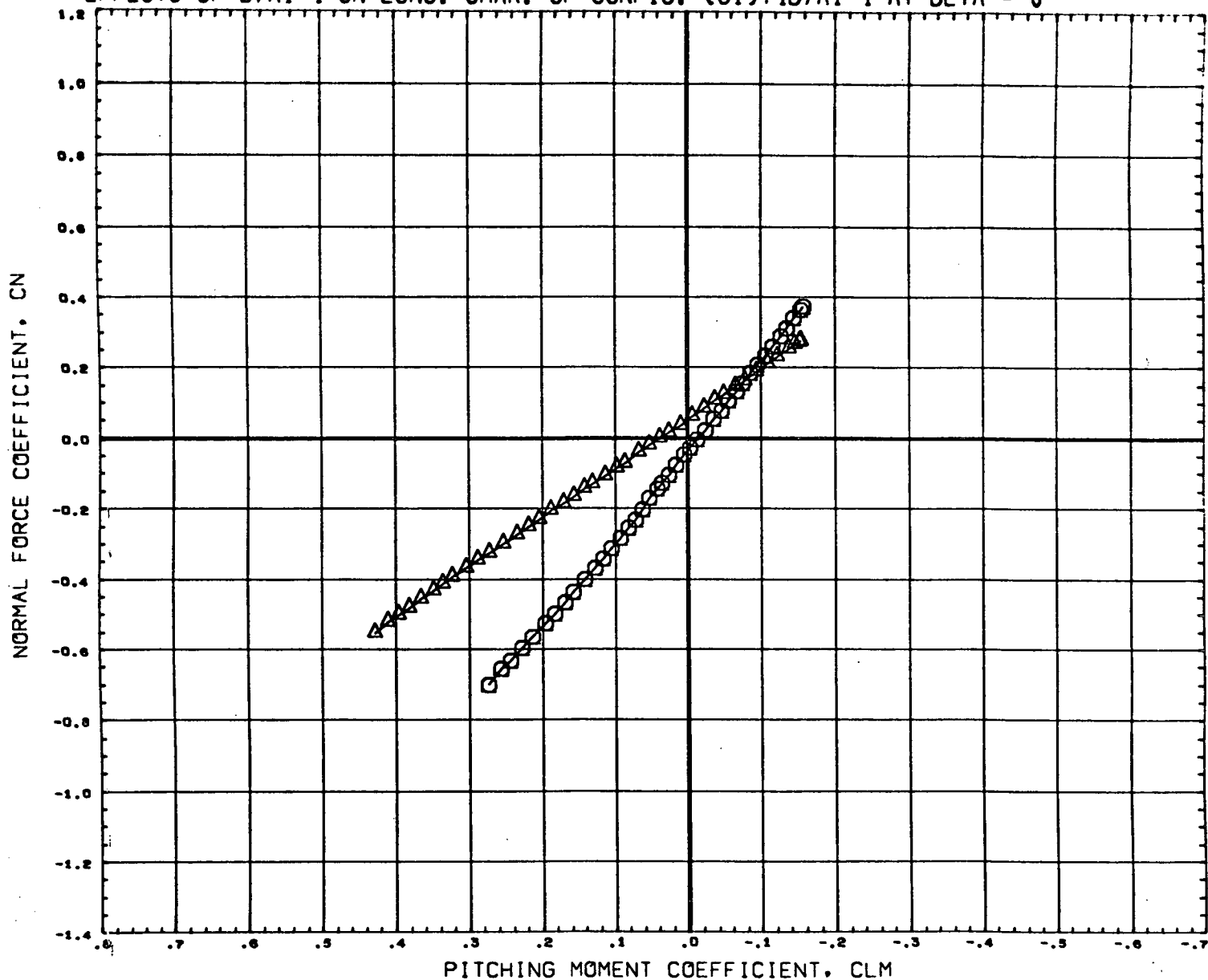
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (CD74D9) | MDAC S-222 COMPOSITE(T-CG) (01)T4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 397.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH 1.08

PAGE 453

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0

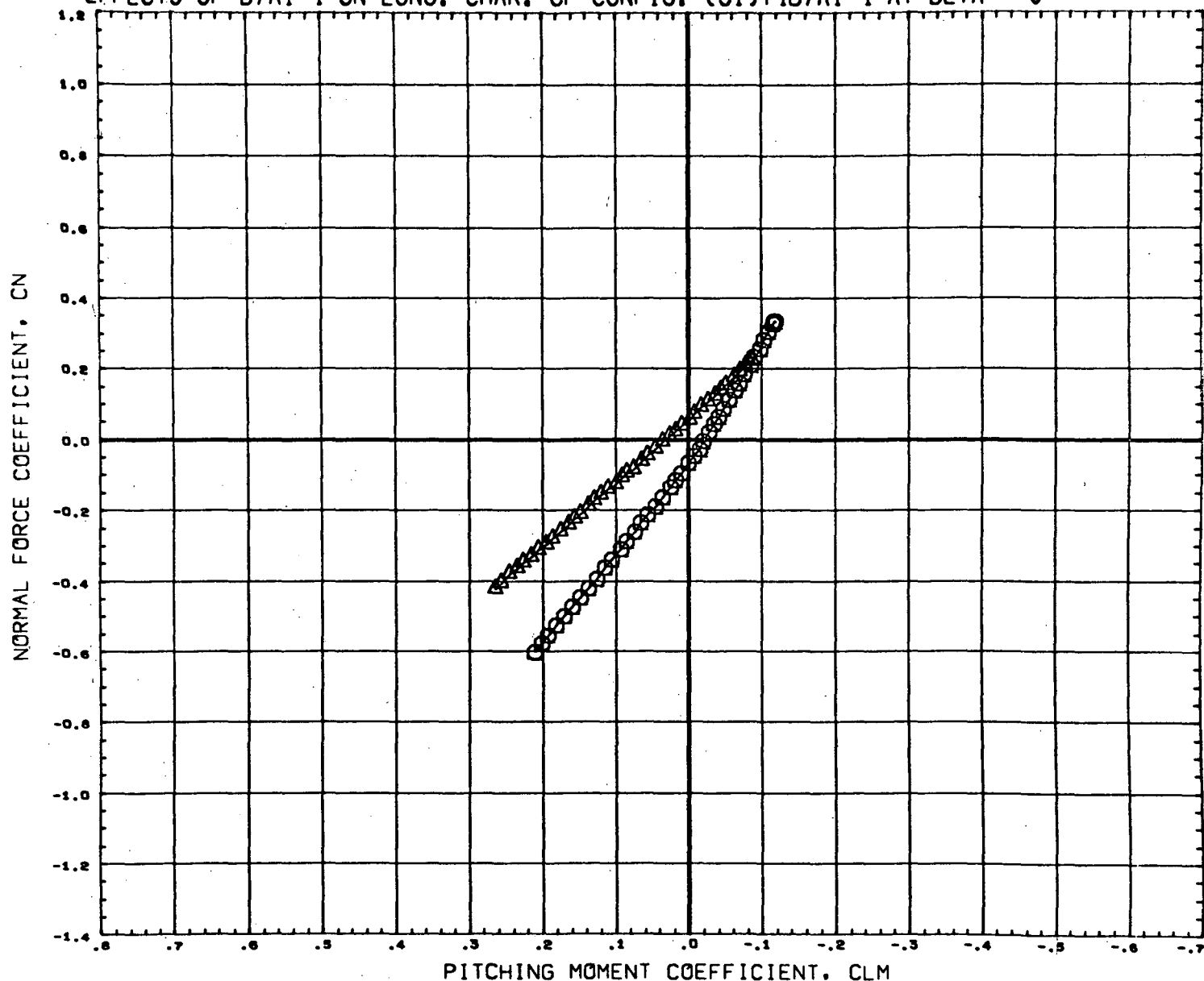


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D9) | MDAC S-222 COMPOSITE(T-CG) (01)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.51

PAGE 454

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0

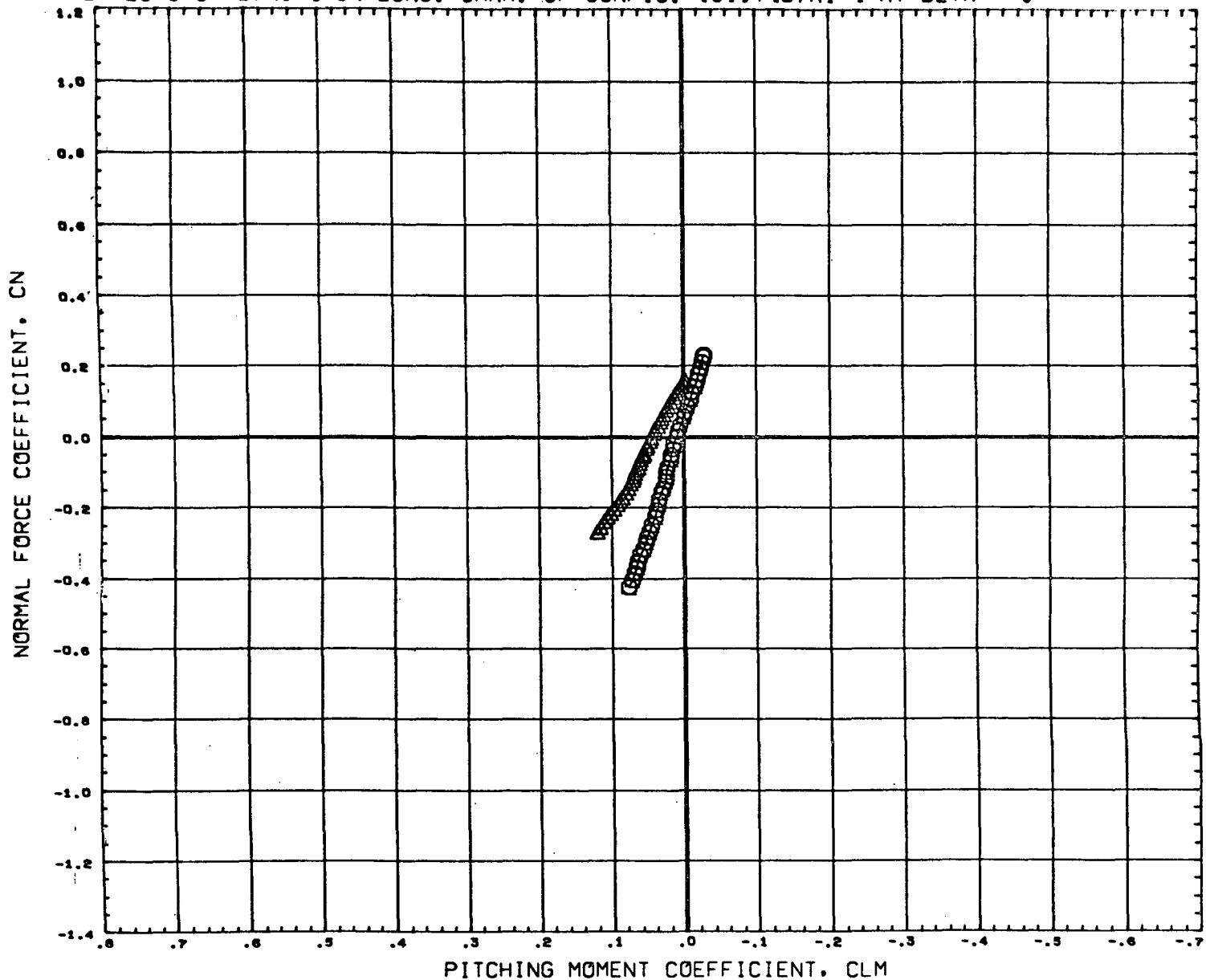


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (C074C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (C074D9) | MDAC S-222 COMPOSITE(T-CG) (01)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

PAGE 455

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0

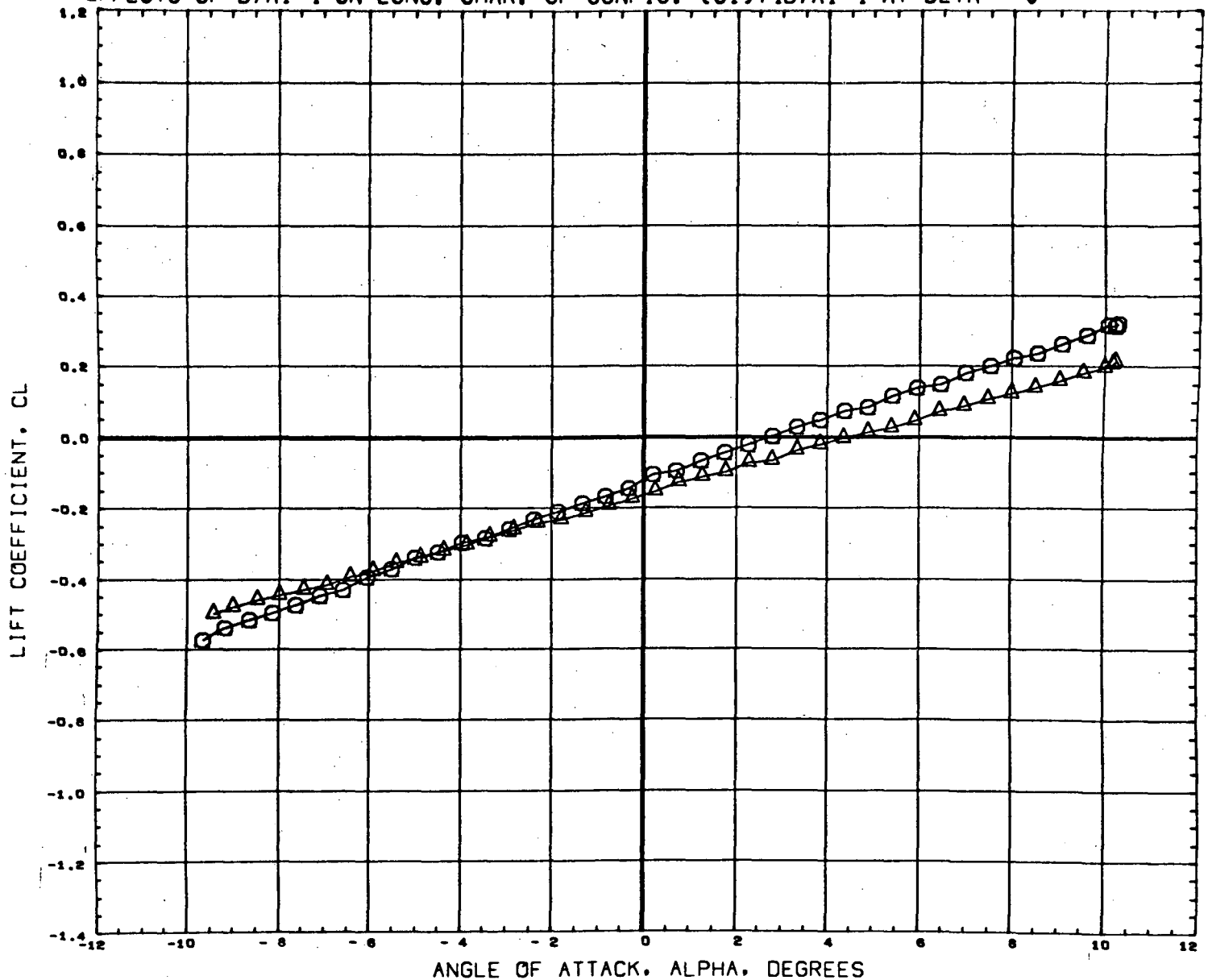


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D9) | MDAC S-222 COMPOSITE(T-CG) (01)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

PAGE 456

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0

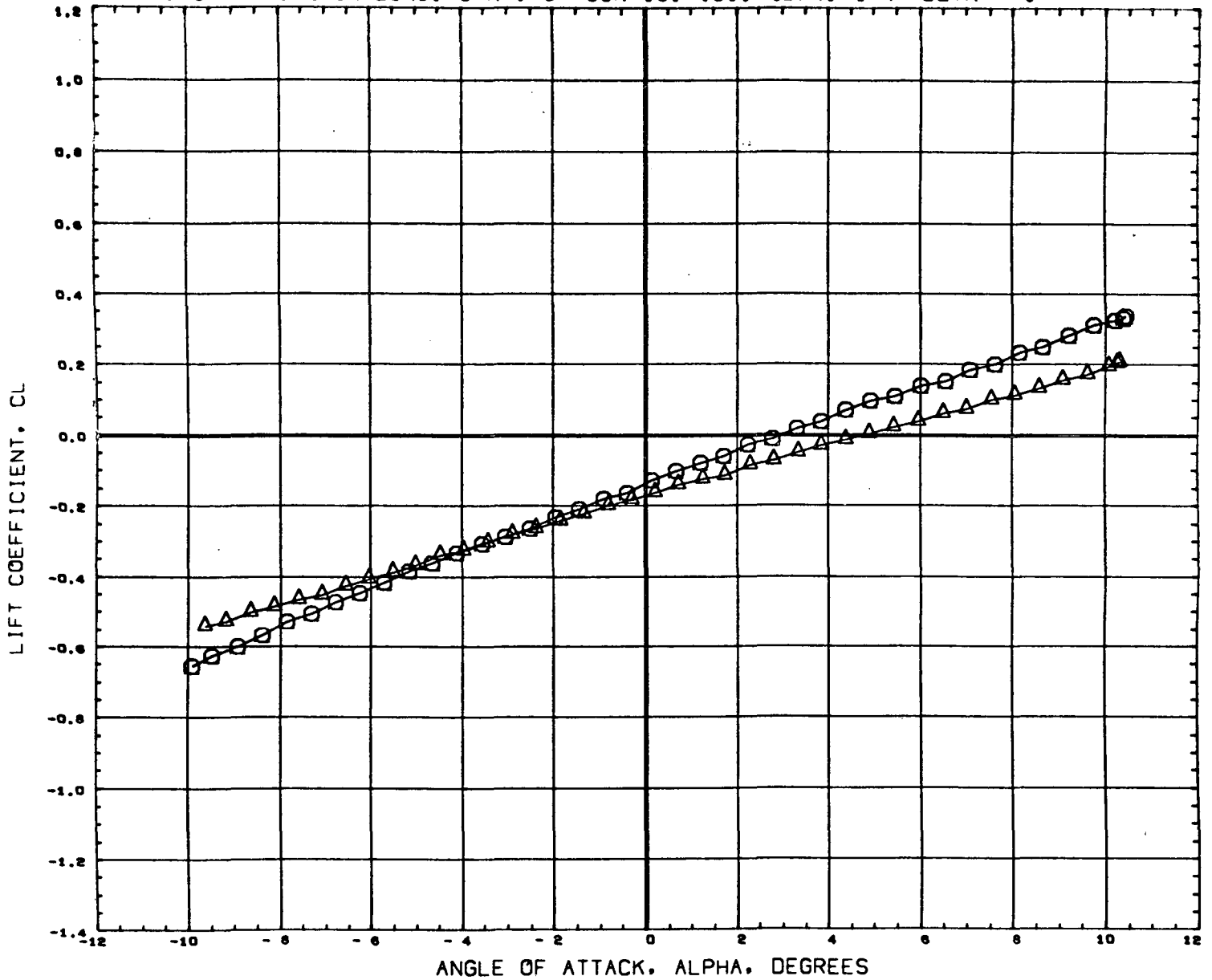


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D9) | MDAC S-222 COMPOSITE(T-CG) (01)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.3004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

PAGE 457

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0



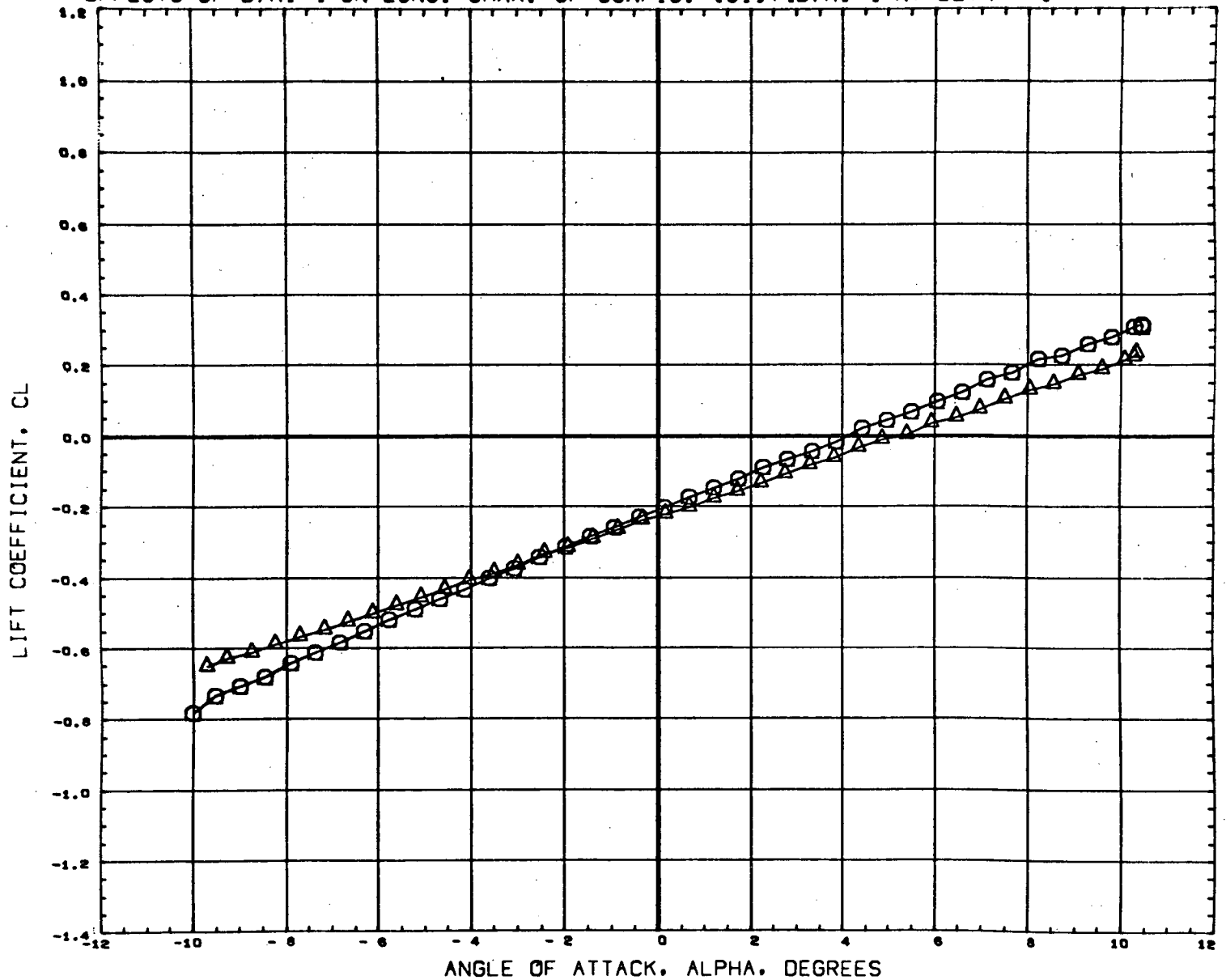
DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) (CD74D9) MDAC S-222 COMPOSITE (T-C6) (01)T4B7A1-4
 MDAC S-222 COMPOSITE (T-C6) (01)T4

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH .90

PAGE 458

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0



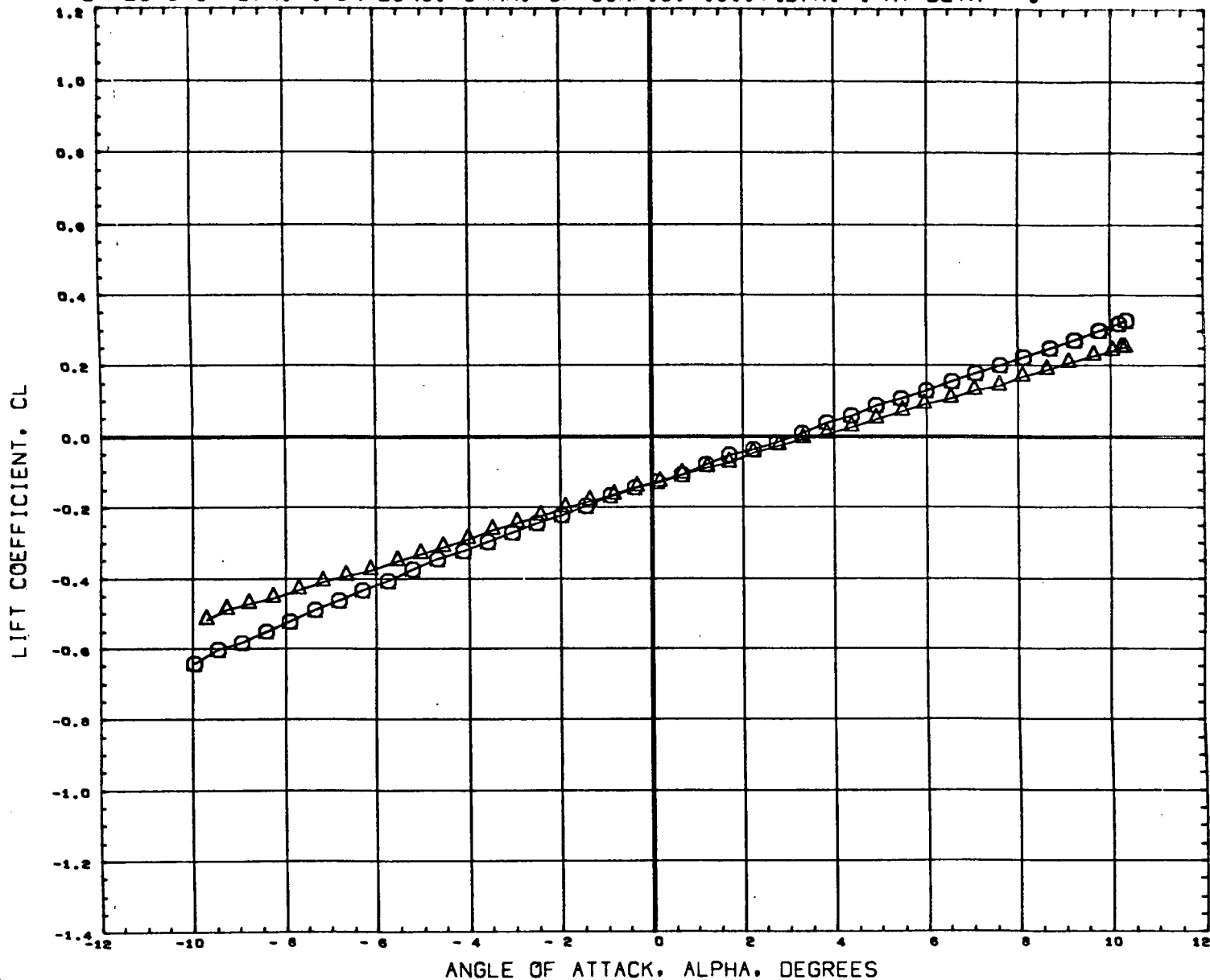
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (CD74D9) | MDAC S-222 COMPOSITE(T-CG) (01)T4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-------|--------|--------|--------|-----------------------|-----------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | BREF | 882.0004 | IN. |
| | | | | XMRP | 557.0004 | IN. |
| | | | | YMRP | 0.0000 | IN. |
| | | | | ZMRP | 200.0004 | IN. |
| | | | | SCALE | 0.0060 | SCALE |

MACH 1.08

PAGE 459

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) (O) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
 (CD74D9) (Δ) MDAC S-222 COMPOSITE (T-CG) (01)T4

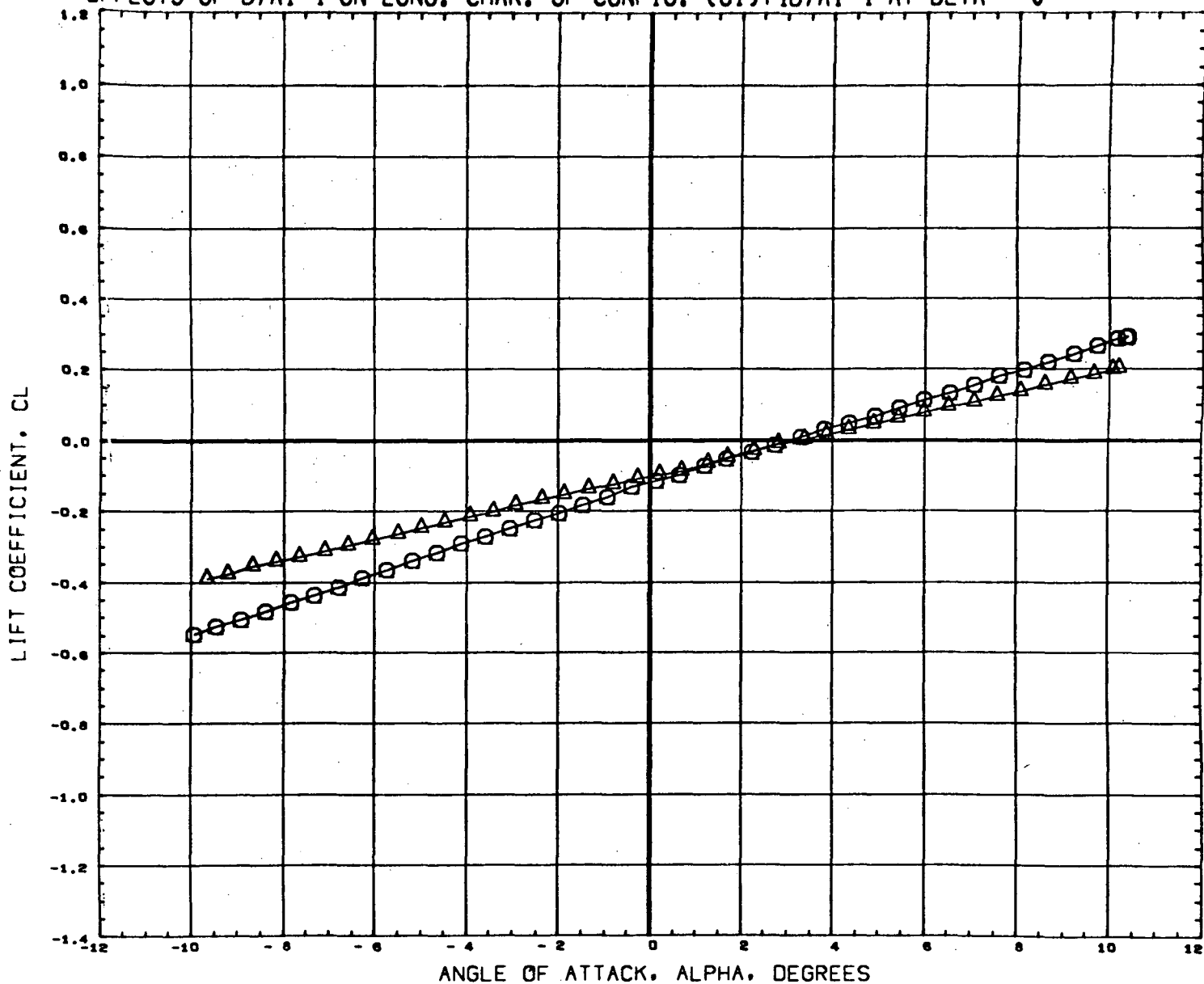
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | 50.FT. |
| LREF | 609.5004 | IN. |
| BREF | 682.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 1.51

PAGE 460

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (O1)T4B7A1-4 AT BETA = 0



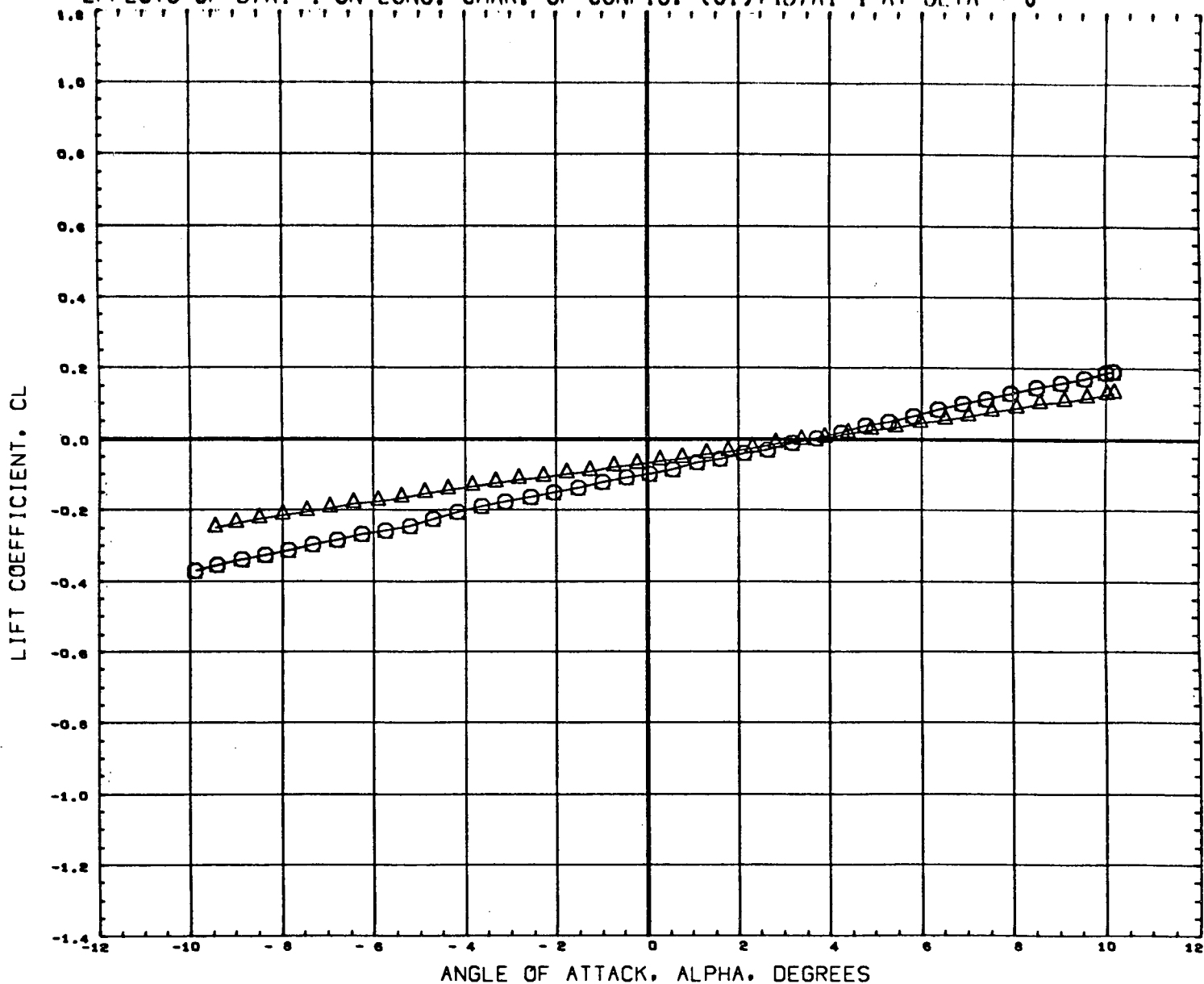
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD74C7) ○ | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 |
| (CD74D9) △ | MDAC S-222 COMPOSITE (T-CG) (O1)T4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SO.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 2.20

PAGE 461

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0



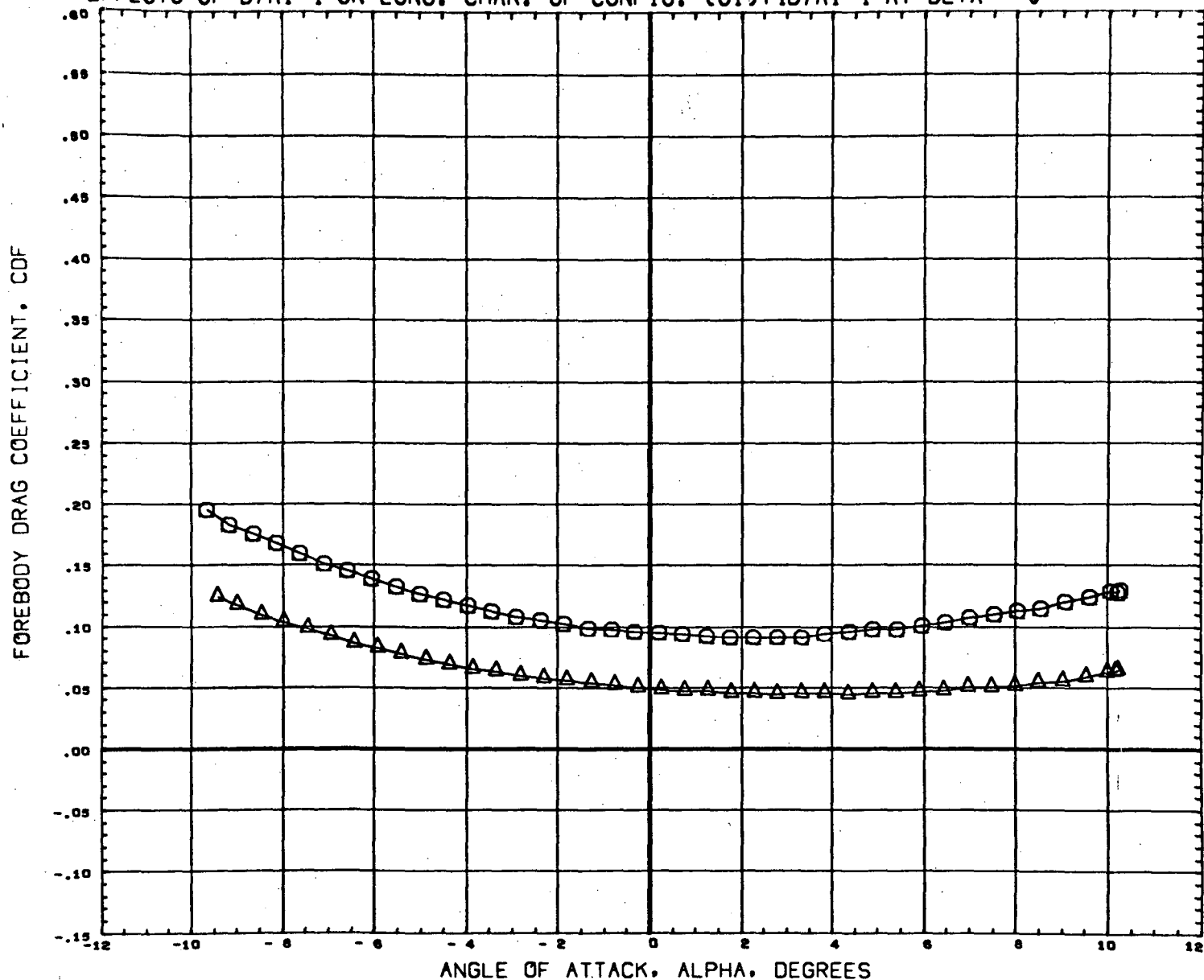
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (CD74D9) | MDAC S-222 COMPOSITE (T-CG) (01)T4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 4.47

PAGE 462

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0



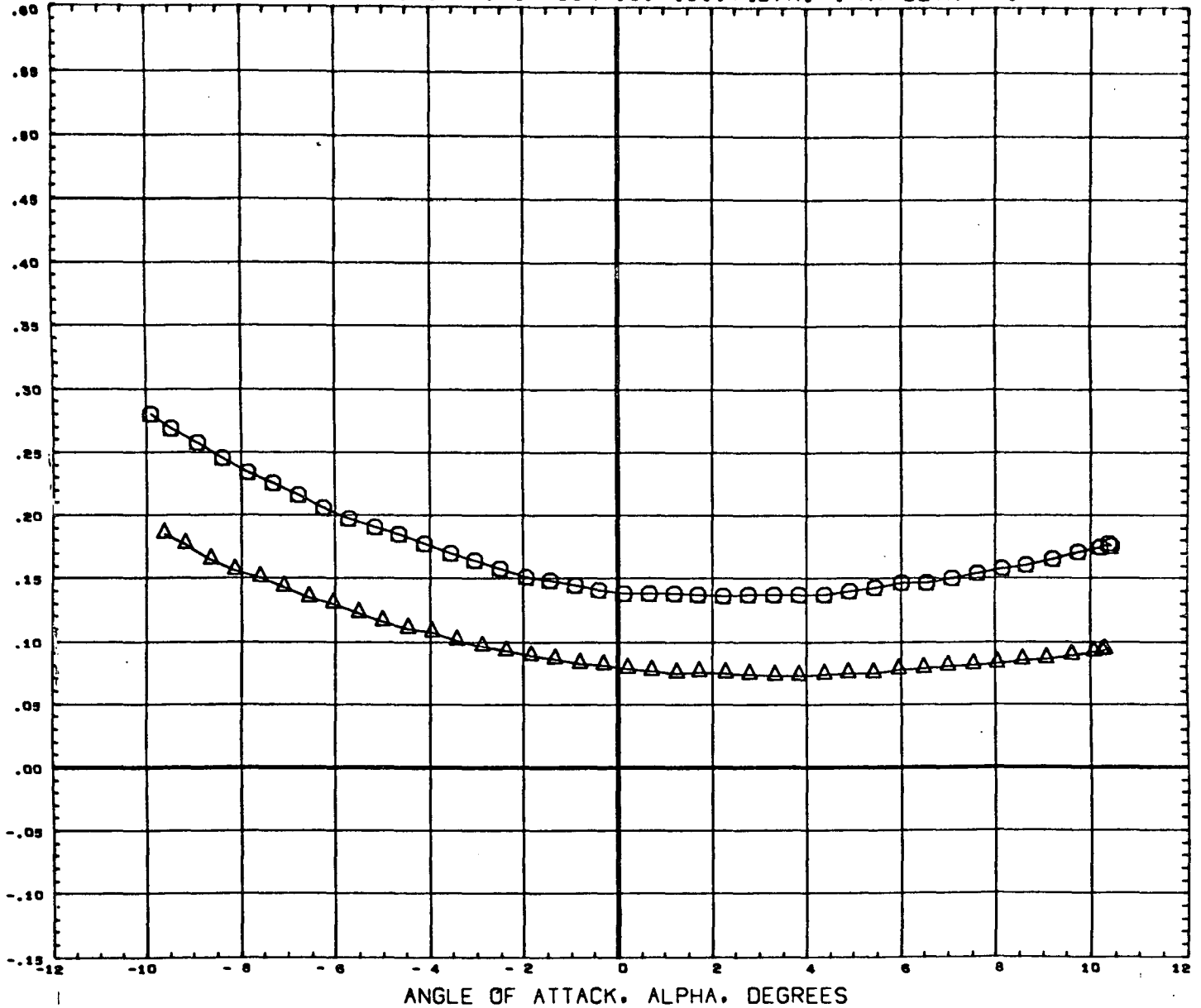
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D9) | MDAC S-222 COMPOSITE(T-CG) (01)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.3004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

PAGE 463

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF

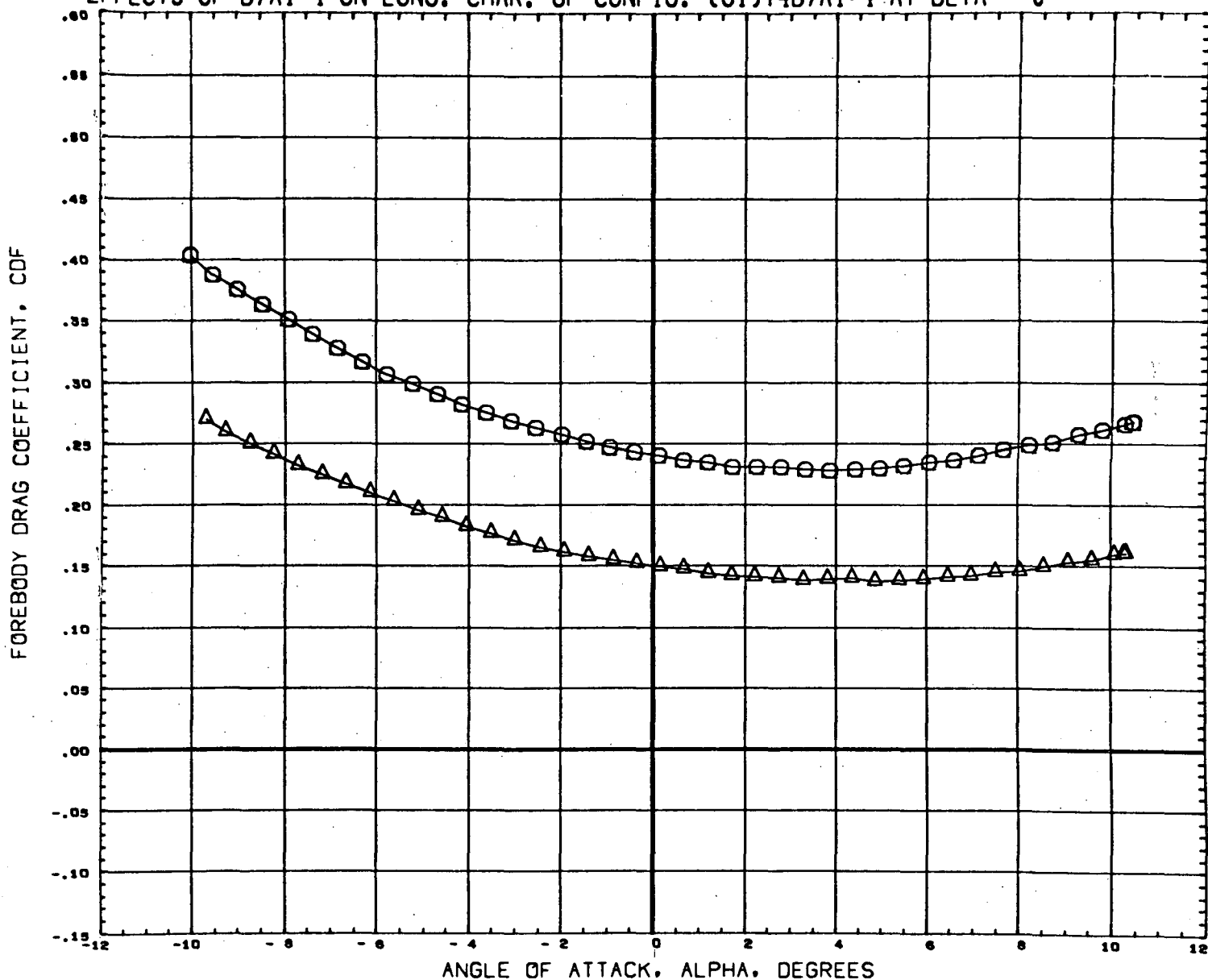


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D9) | MDAC S-222 COMPOSITE (T-CG) (01)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 862.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

PAGE 464

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) (01)T4B7A1-4
 (CD74D9) (01)T4

BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 0.000

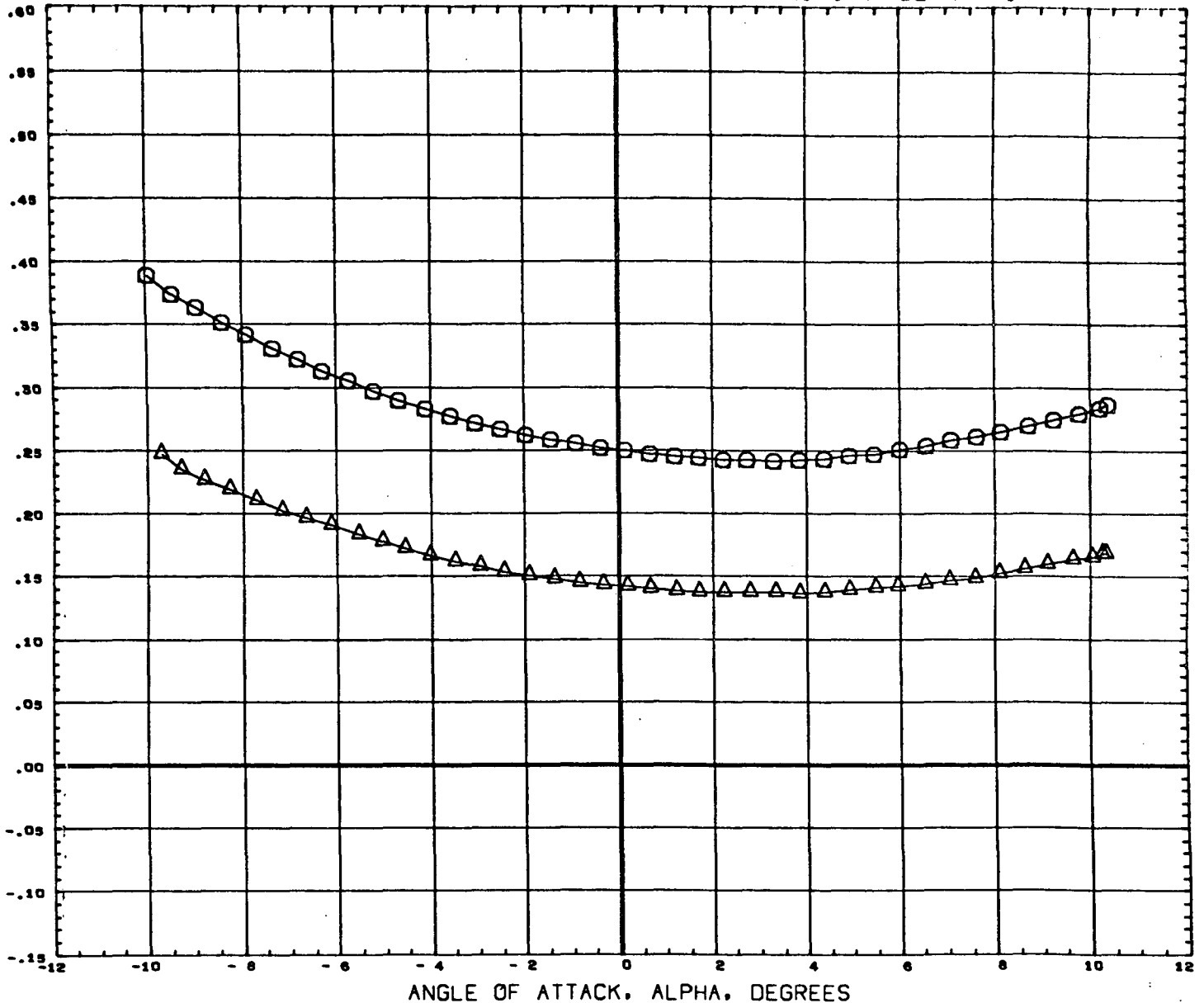
REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH 1.08

PAGE 465

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (O1)T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) ○ MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4
 (CD74D9) Δ MDAC S-222 COMPOSITE (T-CG) (O1)T4

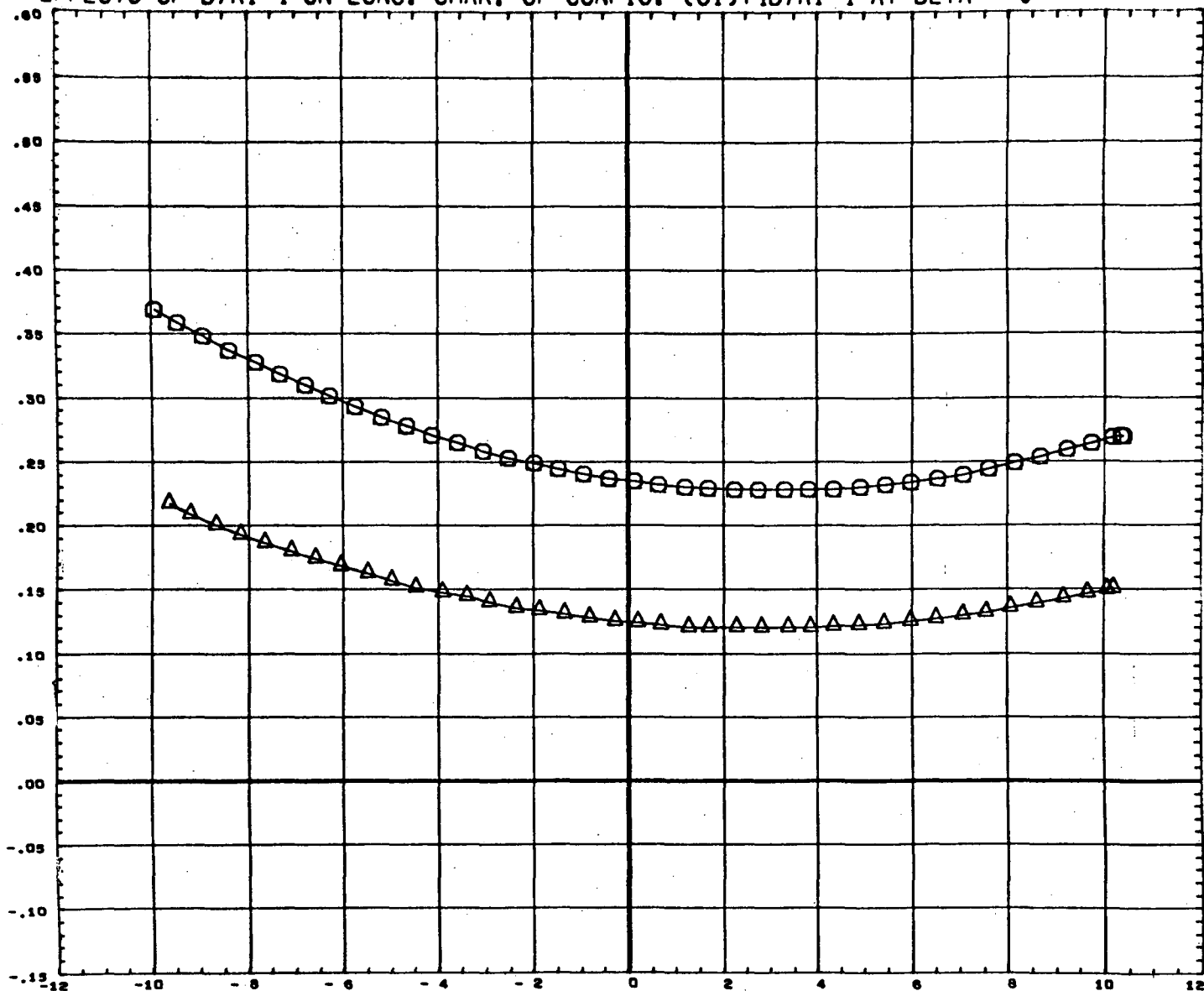
| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 692.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 1.51

PAGE 466

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (O1)T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF

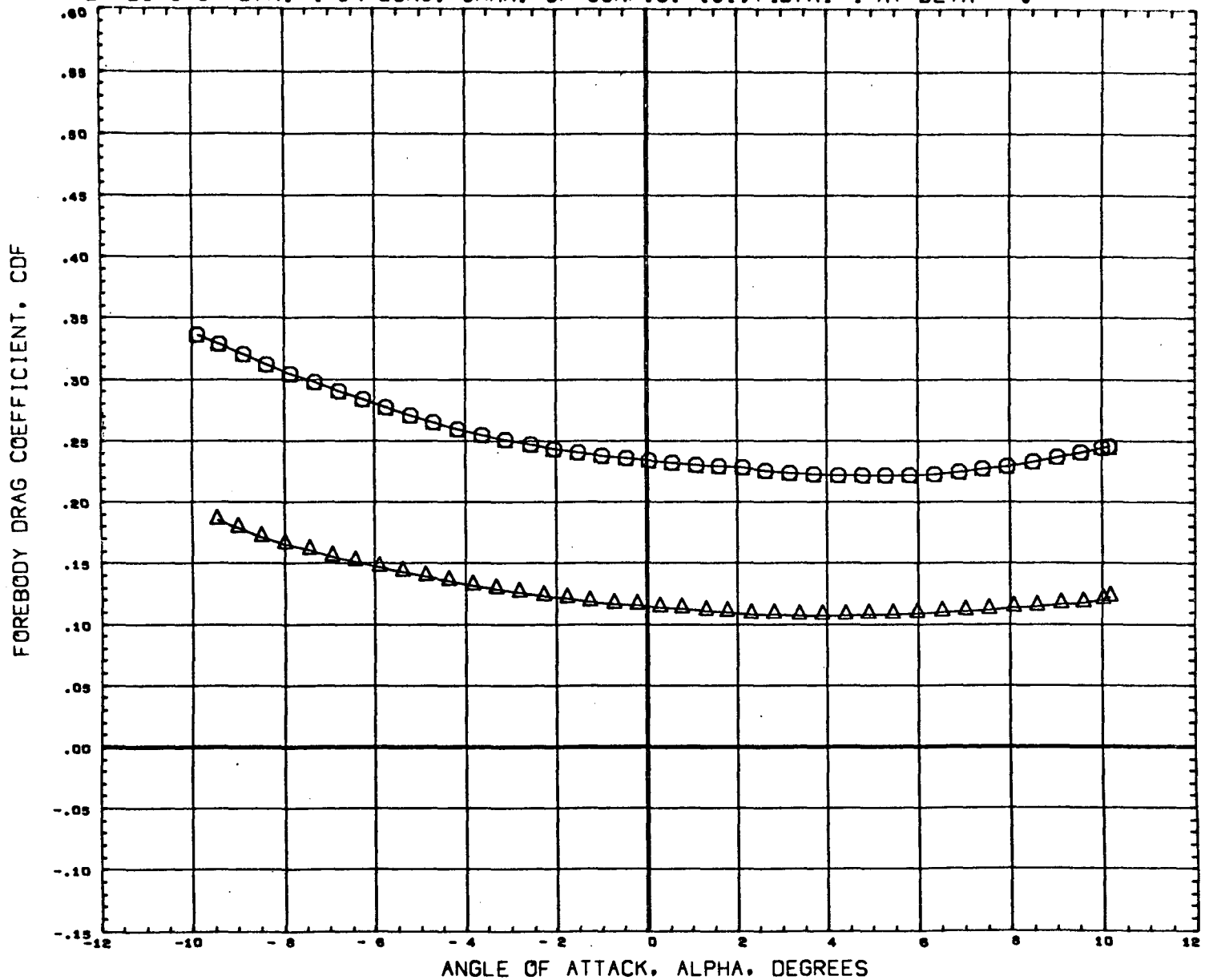


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D9) | MDAC S-222 COMPOSITE (T-CG) (O1)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.3004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

PAGE 467

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0



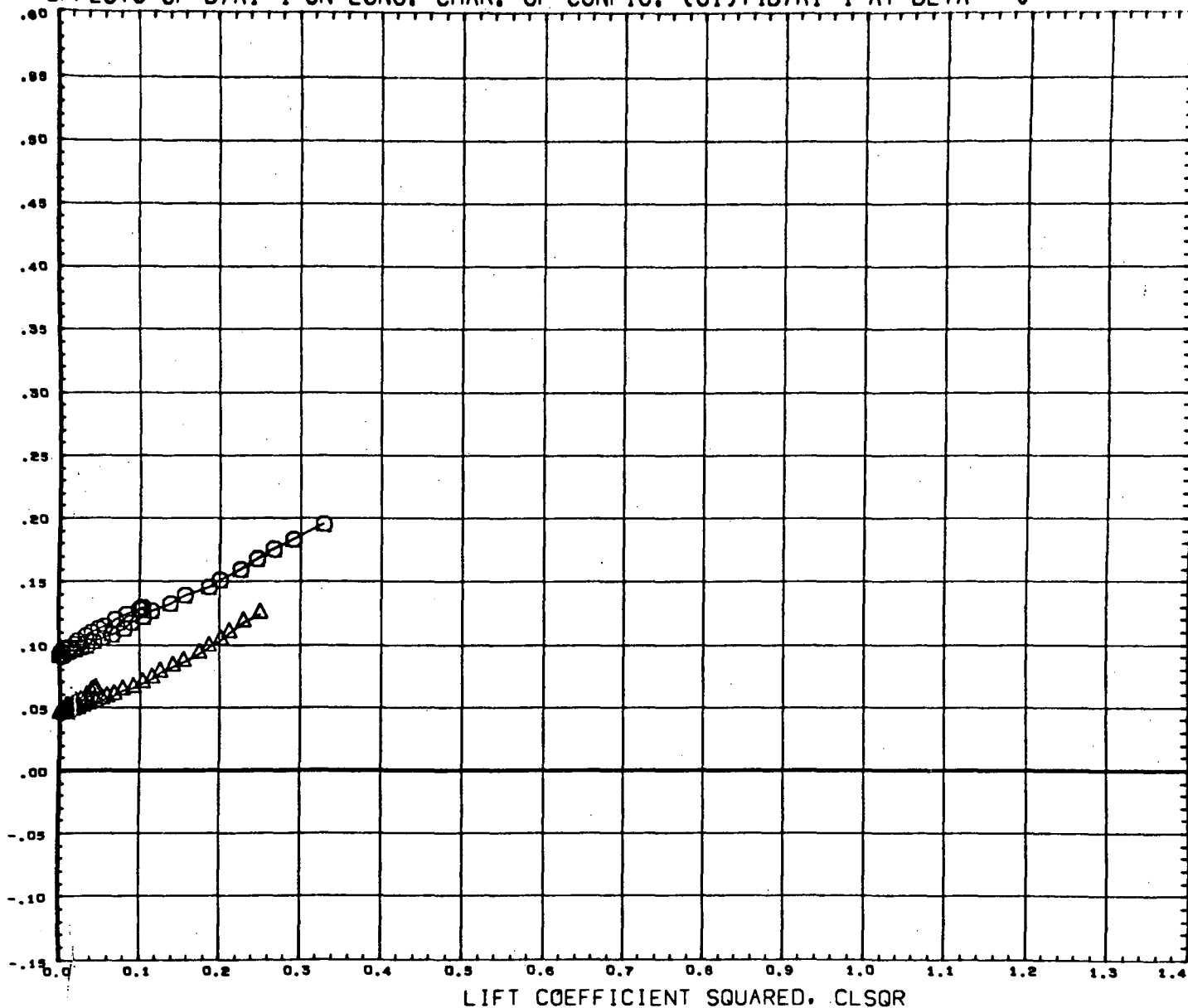
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D9) | MDAC S-222 COMPOSITE (T-CG) (01)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

PAGE 468

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



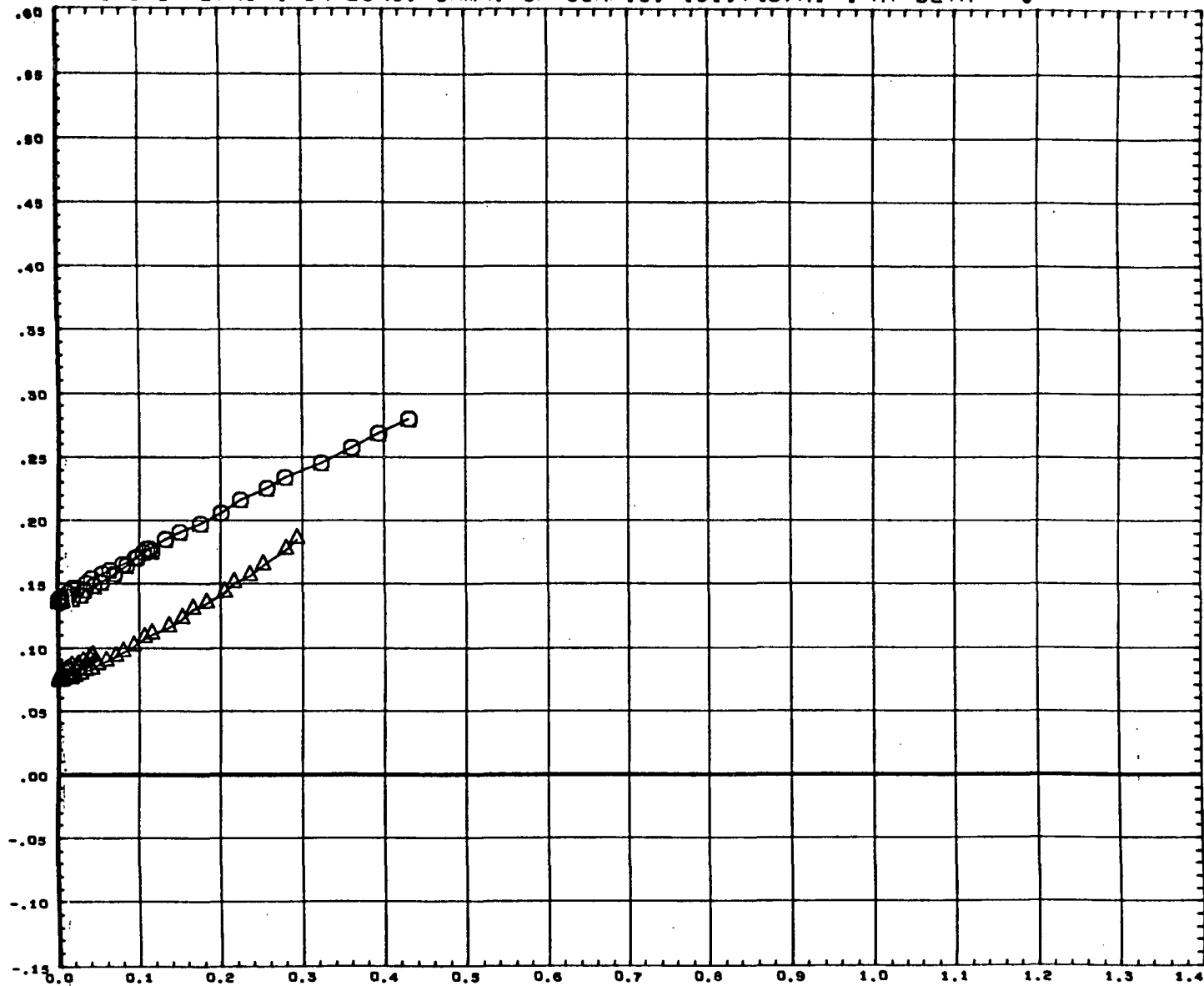
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D9) | MDAC S-222 COMPOSITE(T-CG) (01)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 862.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

PAGE 469

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) ○ MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74D9) △ MDAC S-222 COMPOSITE(T-CG) (01)T4

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

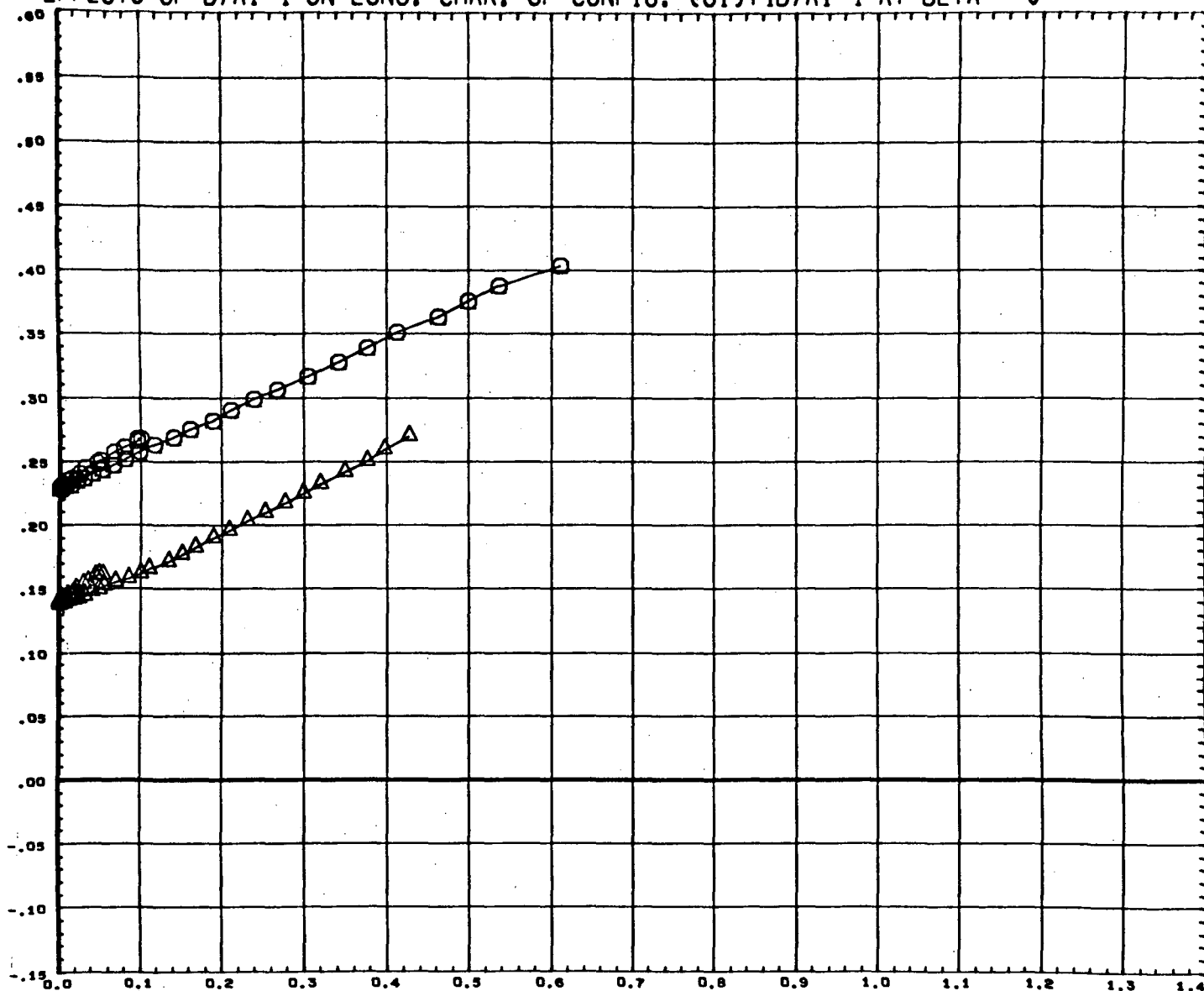
| REFERENCE INFORMATION | |
|-----------------------|------------------|
| SREF | 3155.3040 SQ.FT. |
| LREF | 609.5004 IN. |
| BREF | 882.0004 IN. |
| XMRP | 597.0004 IN. |
| YMRP | 0.0000 IN. |
| ZMRP | 200.0004 IN. |
| SCALE | 0.0060 SCALE |

MACH .90

PAGE 470

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



LIFT COEFFICIENT SQUARED, CLSQ

DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
 (CD74D9) MDAC S-222 COMPOSITE (T-CG) (01)T4

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|---------|
| SREF | 3155.3040 | SQ. FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 537.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

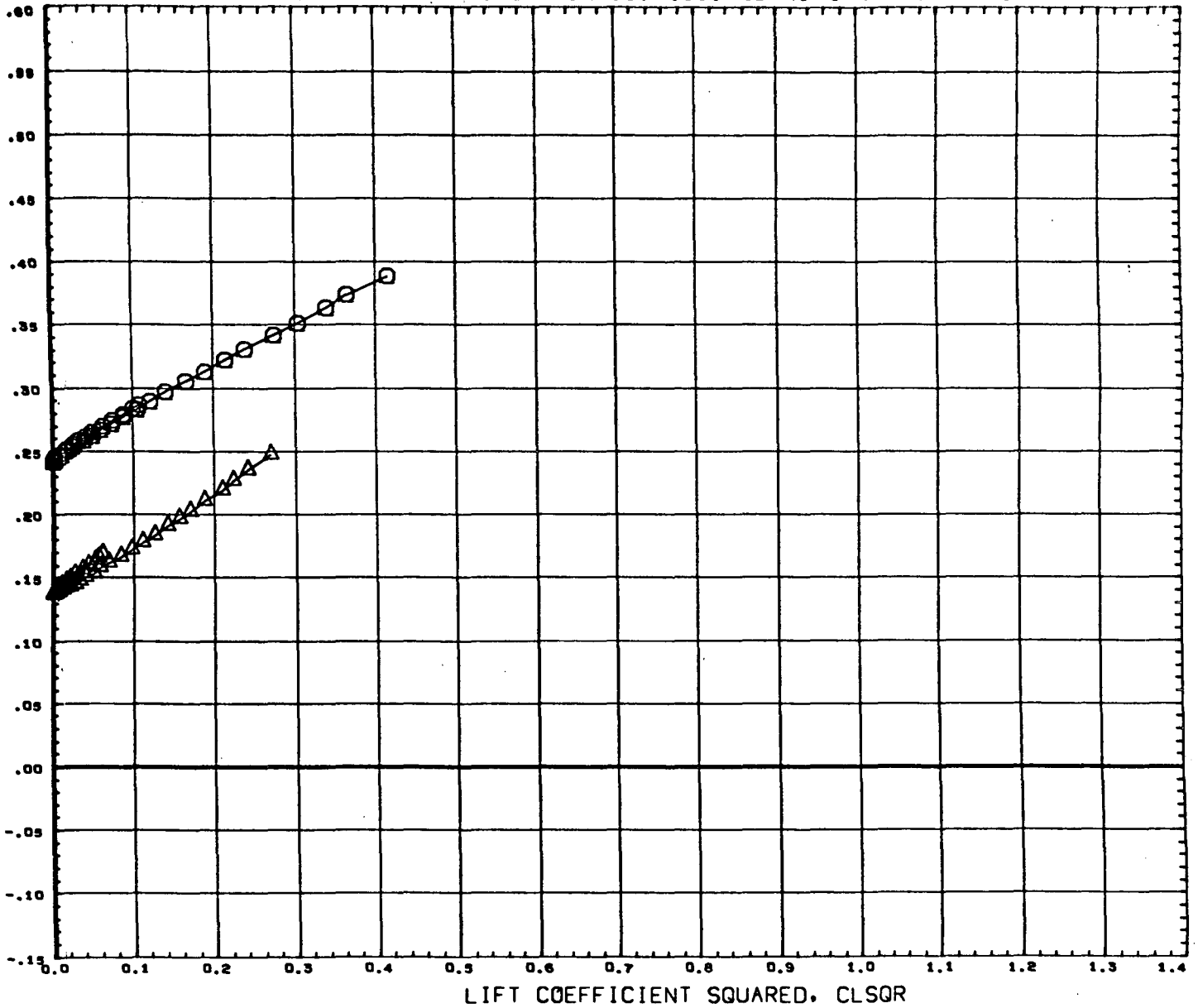
MACH

1.08

PAGE 471

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



| DATA SET | SYMBOL | CONFIGURATION DESCRIPTION |
|----------|--------|--|
| (CD74C7) | ○ | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (CD74D9) | △ | MDAC S-222 COMPOSITE (T-CG) (01)T4 |

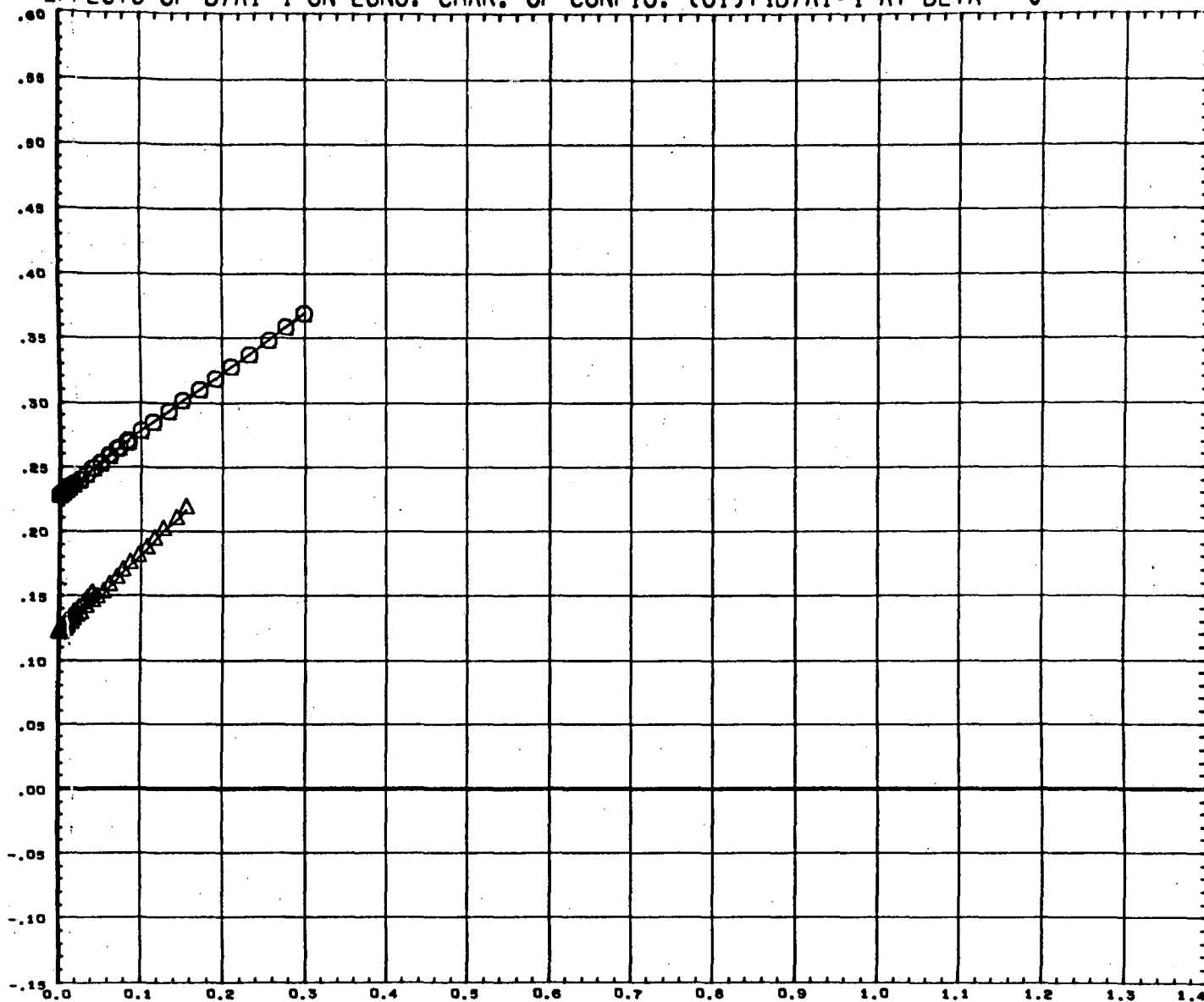
| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3193.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 1.51

PAGE 472

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (O1)T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 |
| (CD74D9) | MDAC S-222 COMPOSITE(T-CG) (O1)T4 |

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

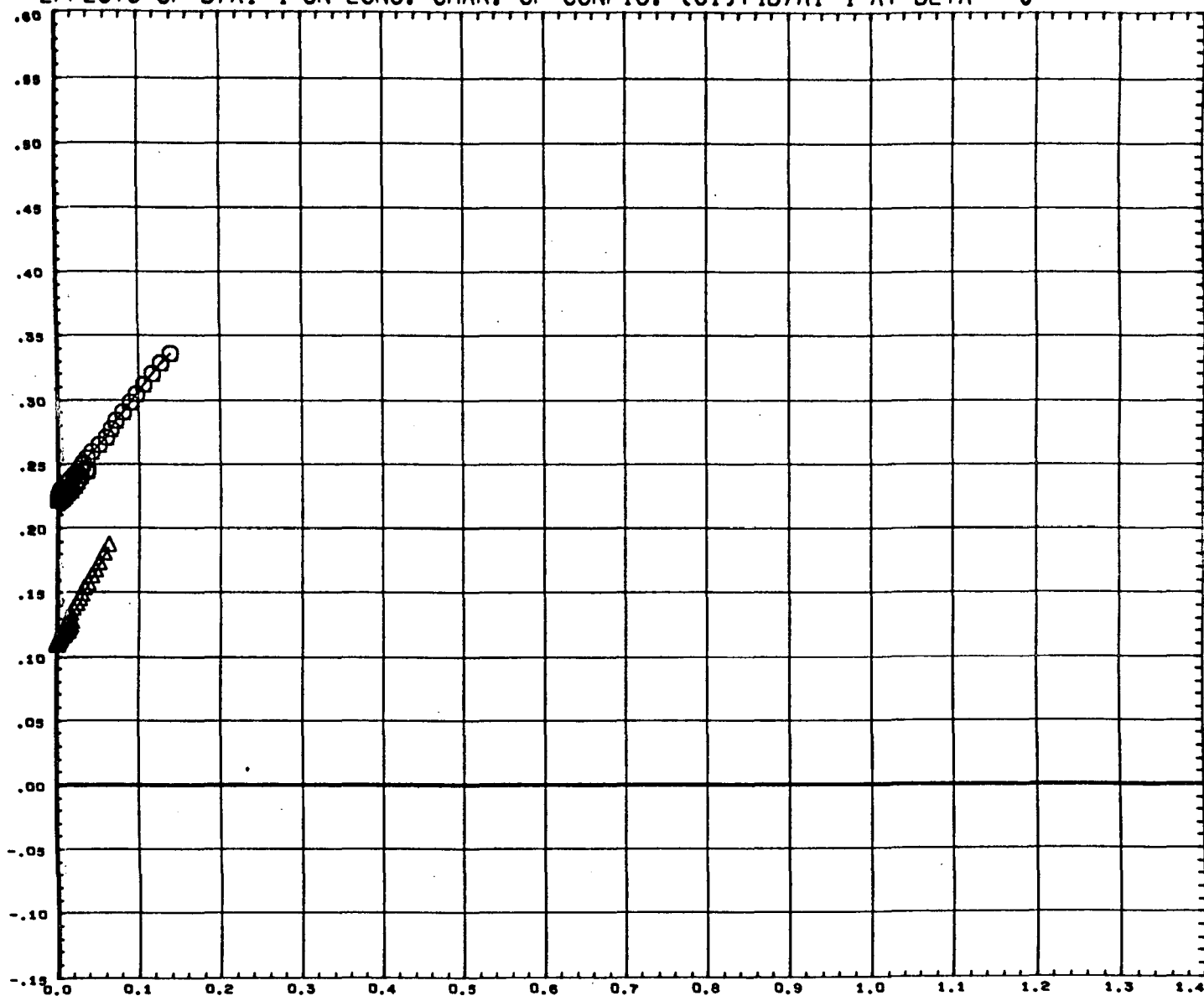
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 682.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 2.20

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EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



LIFT COEFFICIENT SQUARED, CLSQ

DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
(CD74D9)  MDAC S-222 COMPOSITE (T-CG) (01)T4

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

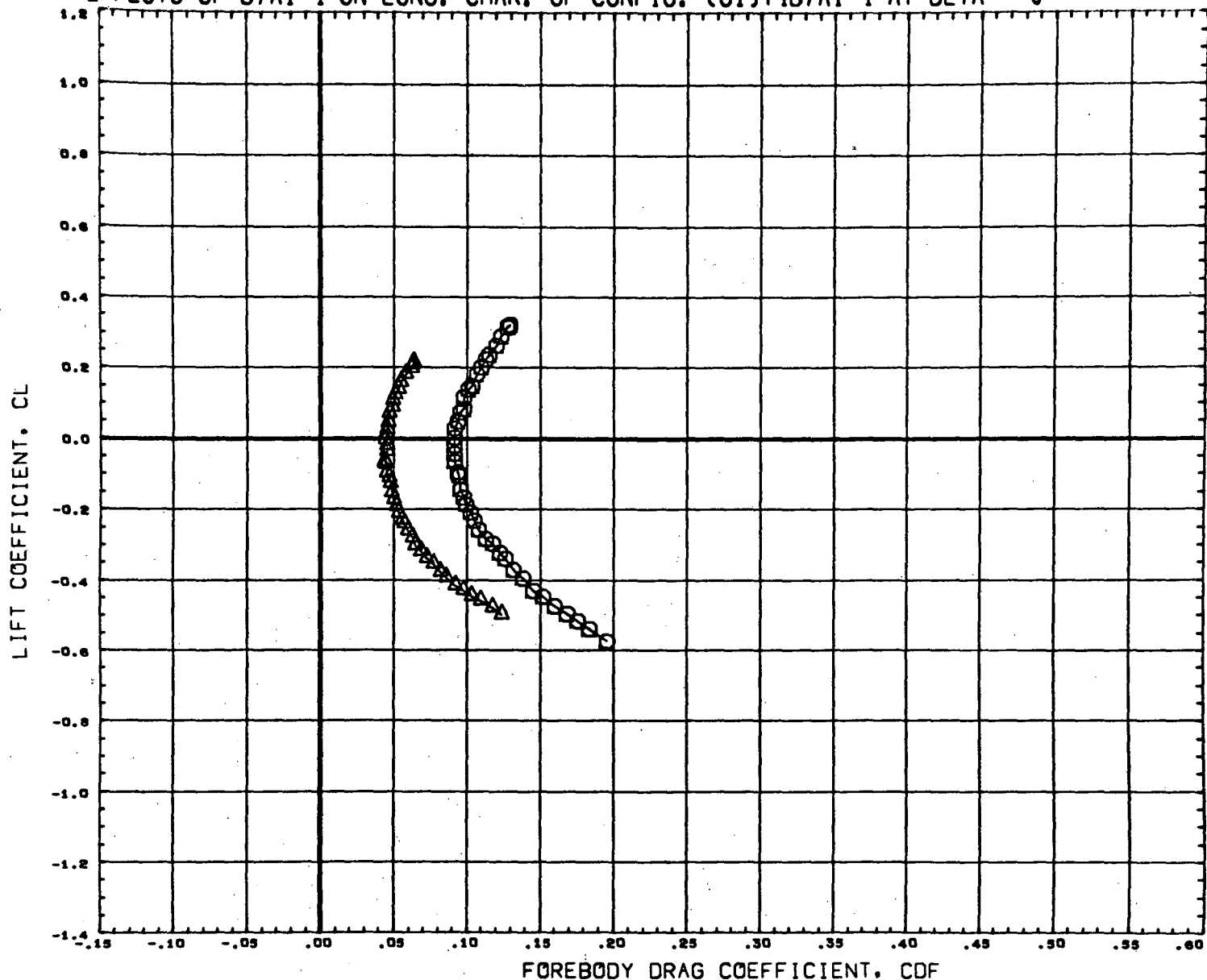
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH

4.47

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EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) (01)T4B7A1-4
 (CD74D9) (01)T4

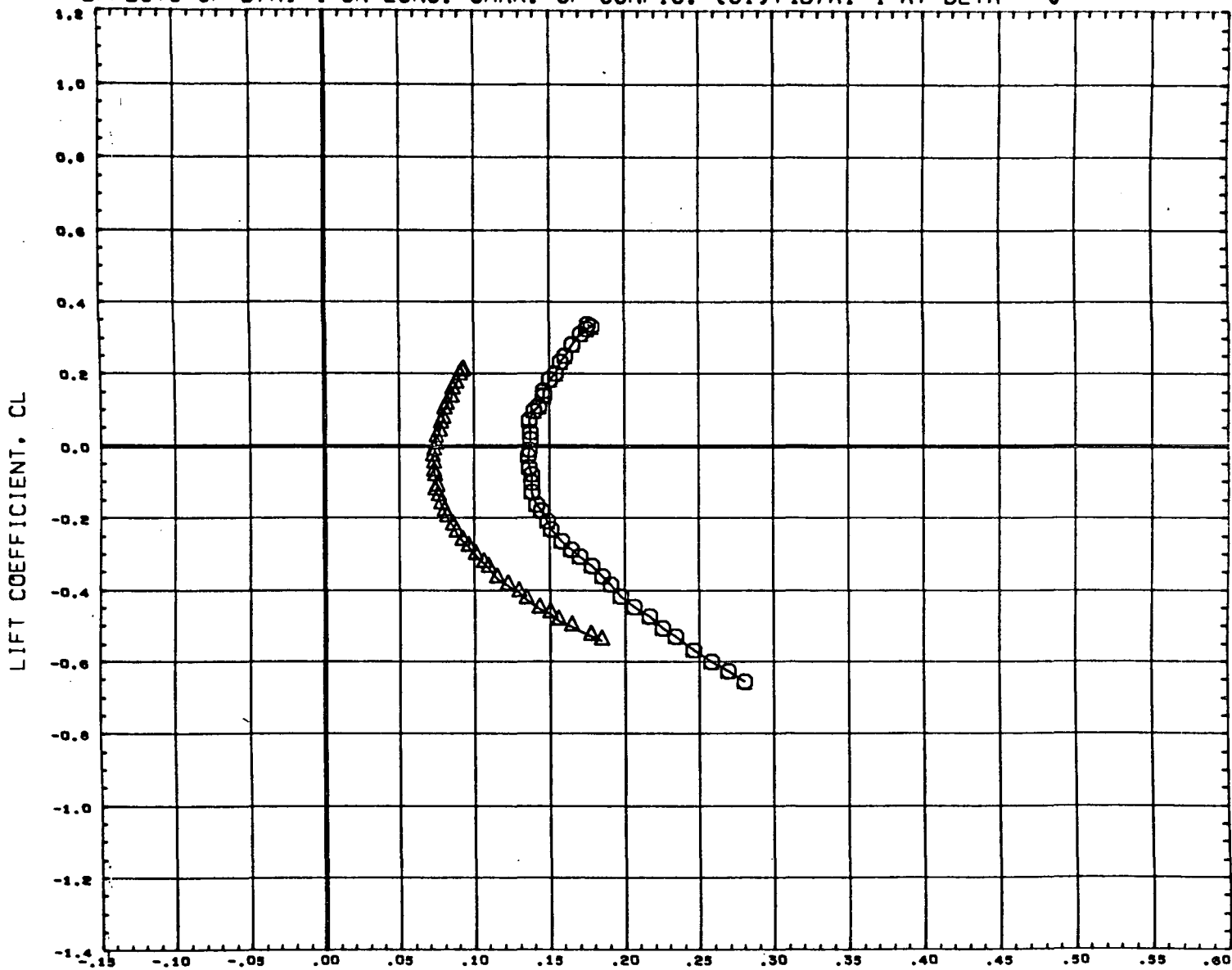
BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 662.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH .58

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EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (O1)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(C074C7) (O) MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4
 (C074D9) (Δ) MDAC S-222 COMPOSITE (T-CG) (O1)T4

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

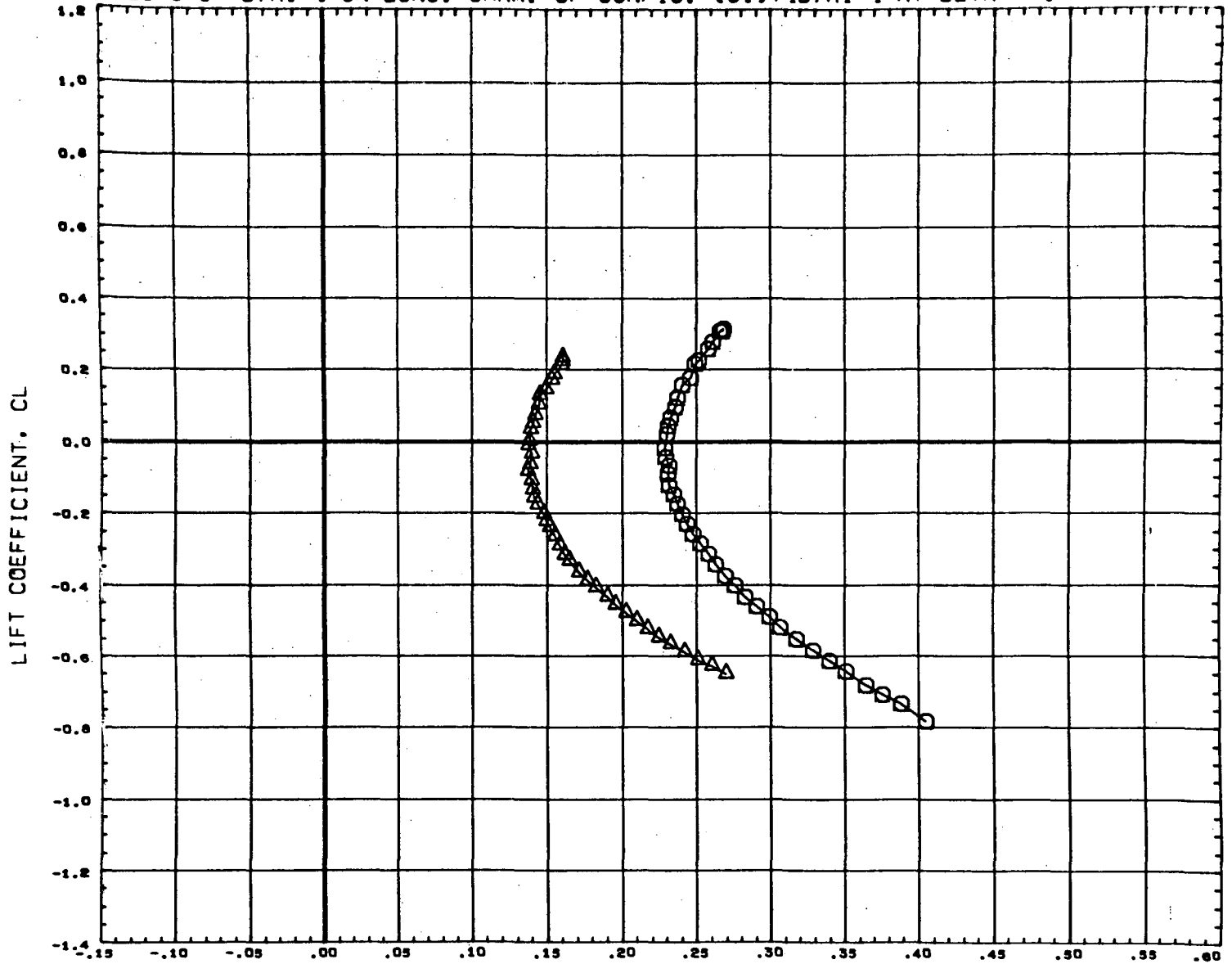
REFERENCE INFORMATION

| | | |
|-------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |



MACH .90

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EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (O1)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7)  MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4
 (CD74D9)  MDAC S-222 COMPOSITE(T-CG) (O1)T4

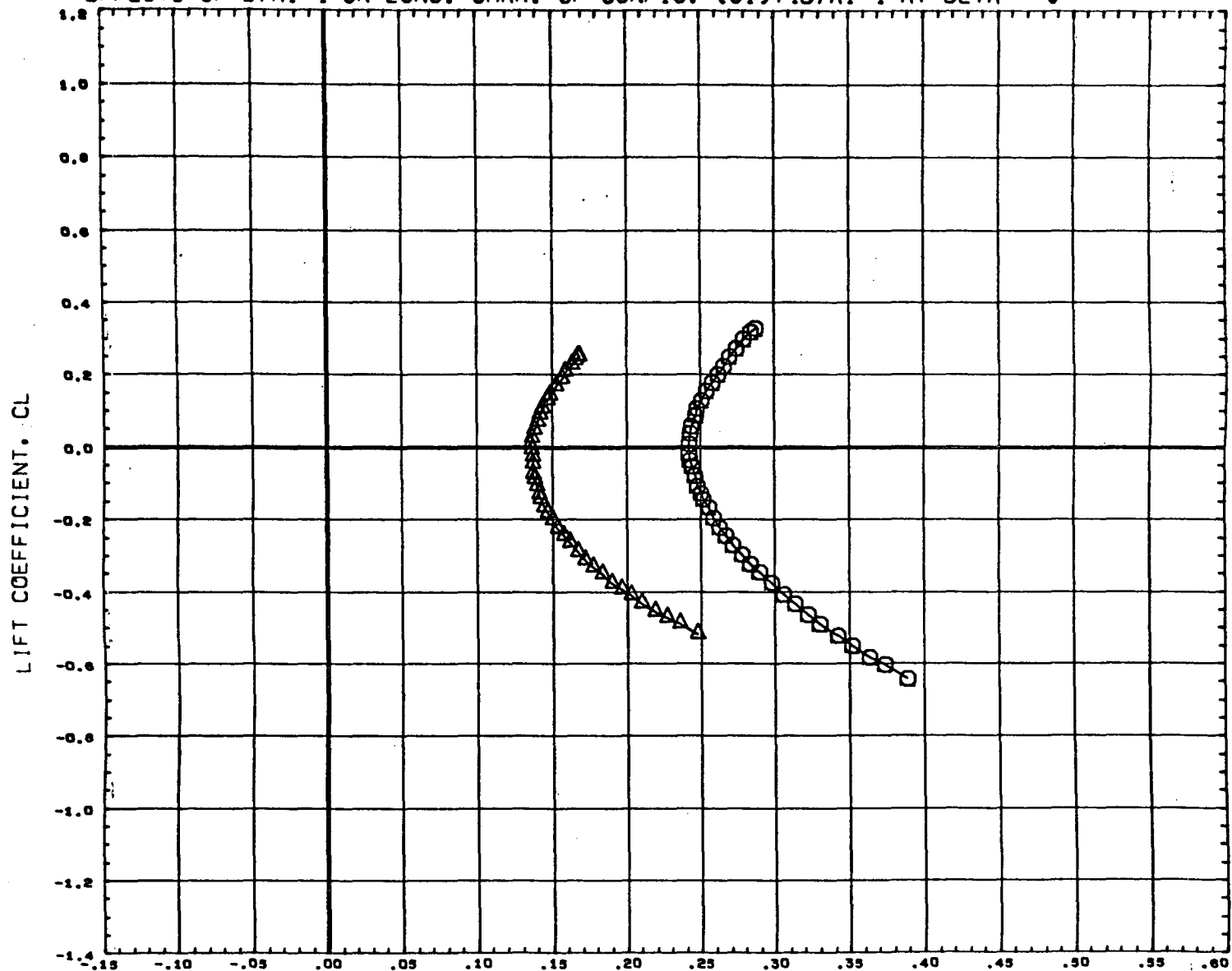
BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.3004 IN.
 BREF 882.0004 IN.
 XMRP 957.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH 1.08

PAGE 477

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (O1)T4B7A1-4 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) (O) MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4
 (CD74D9) (A) MDAC S-222 COMPOSITE(T-CG) (O1)T4

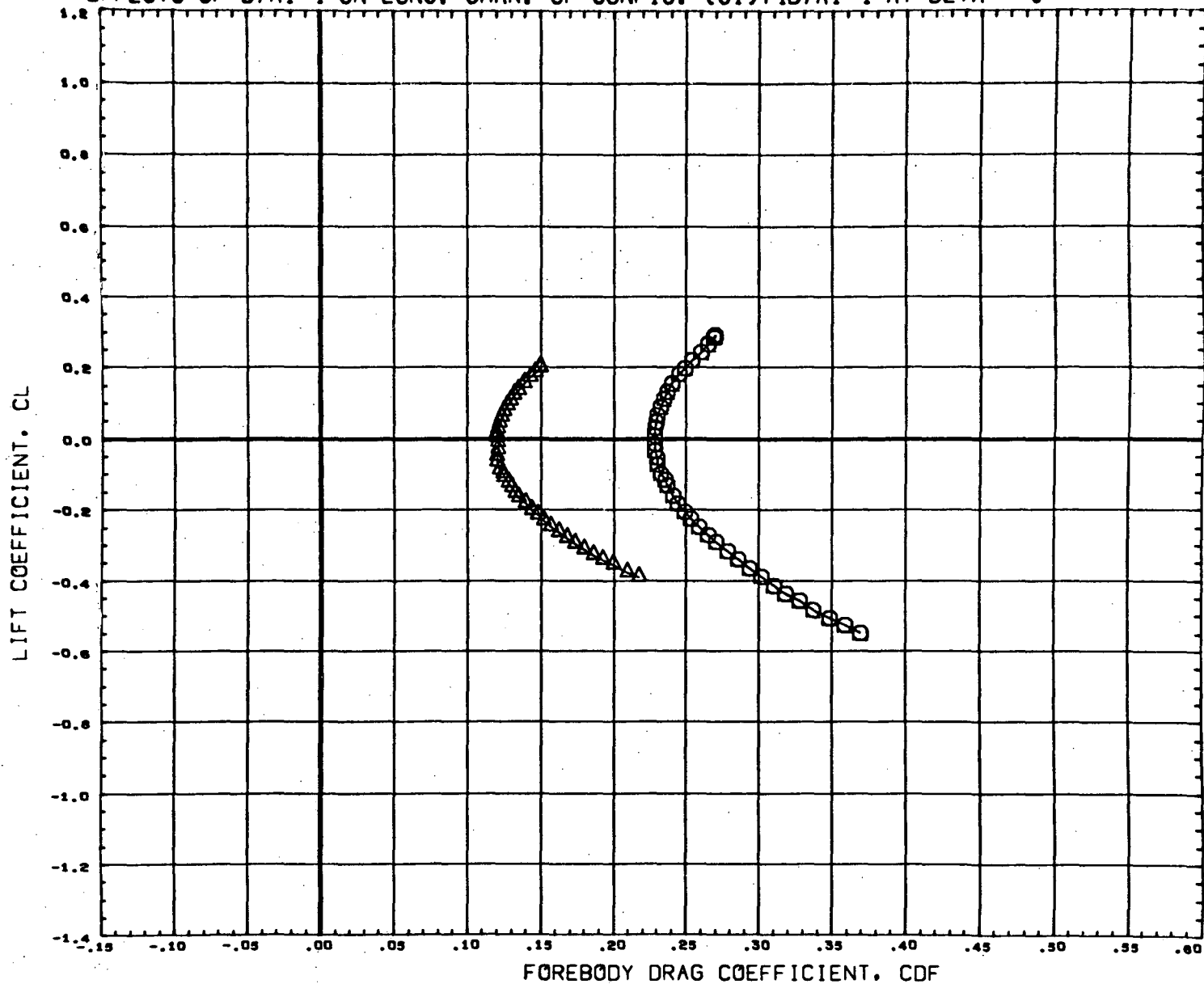
BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH 1.51

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EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0



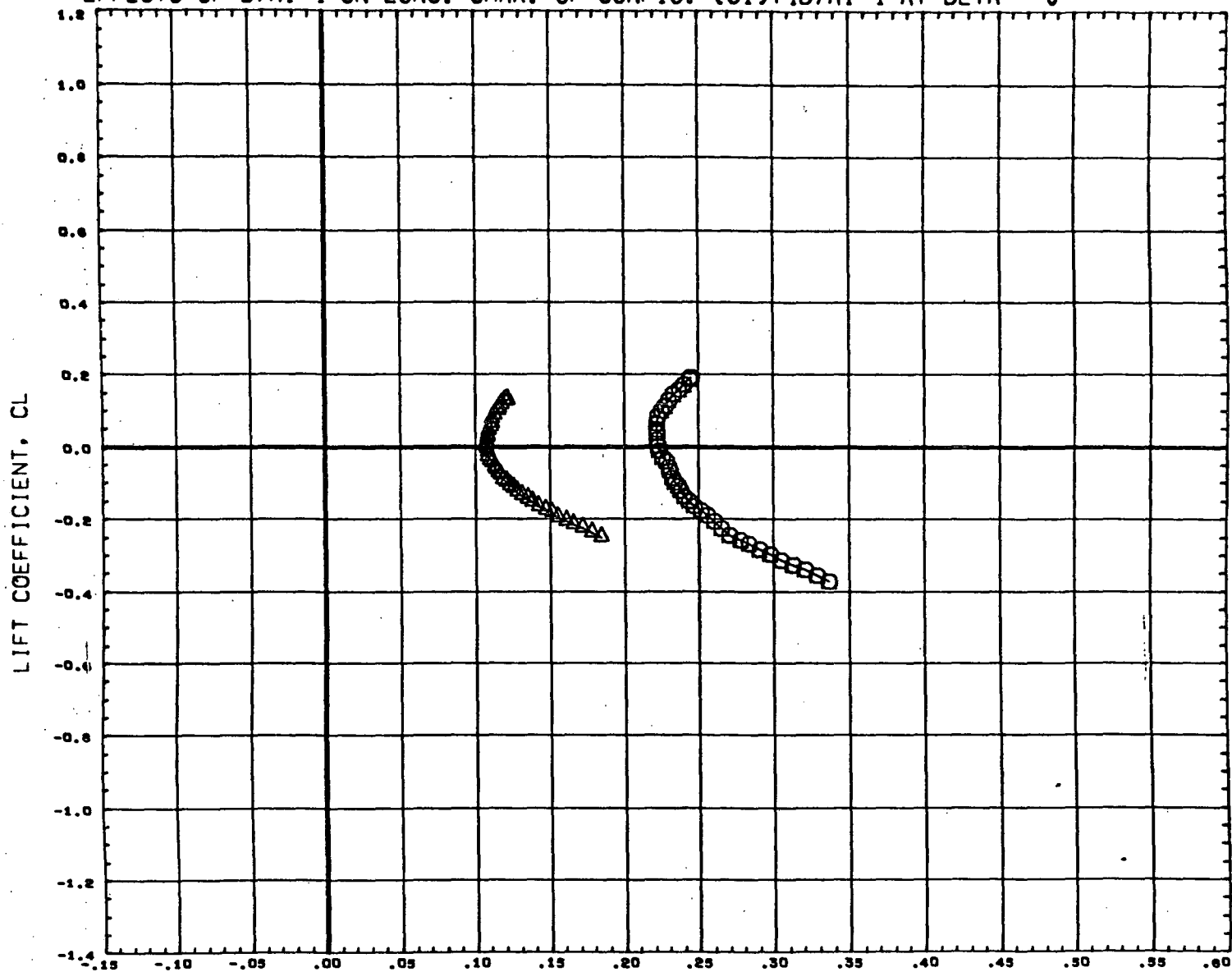
DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) (01)T4B7A1-4
 (CD74D9) (01)T4

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-------|--------|--------|--------|-----------------------|-----------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | BREF | 882.0004 | IN. |
| | | | | XMRP | 557.0004 | IN. |
| | | | | YMRP | 0.0000 | IN. |
| | | | | ZMRP | 200.0004 | IN. |
| | | | | SCALE | 0.0060 | SCALE |

MACH 2.20

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EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0



FOREBODY DRAG COEFFICIENT, CDF

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (CD74D9) | MDAC S-222 COMPOSITE(T-CG) (01)T4 |

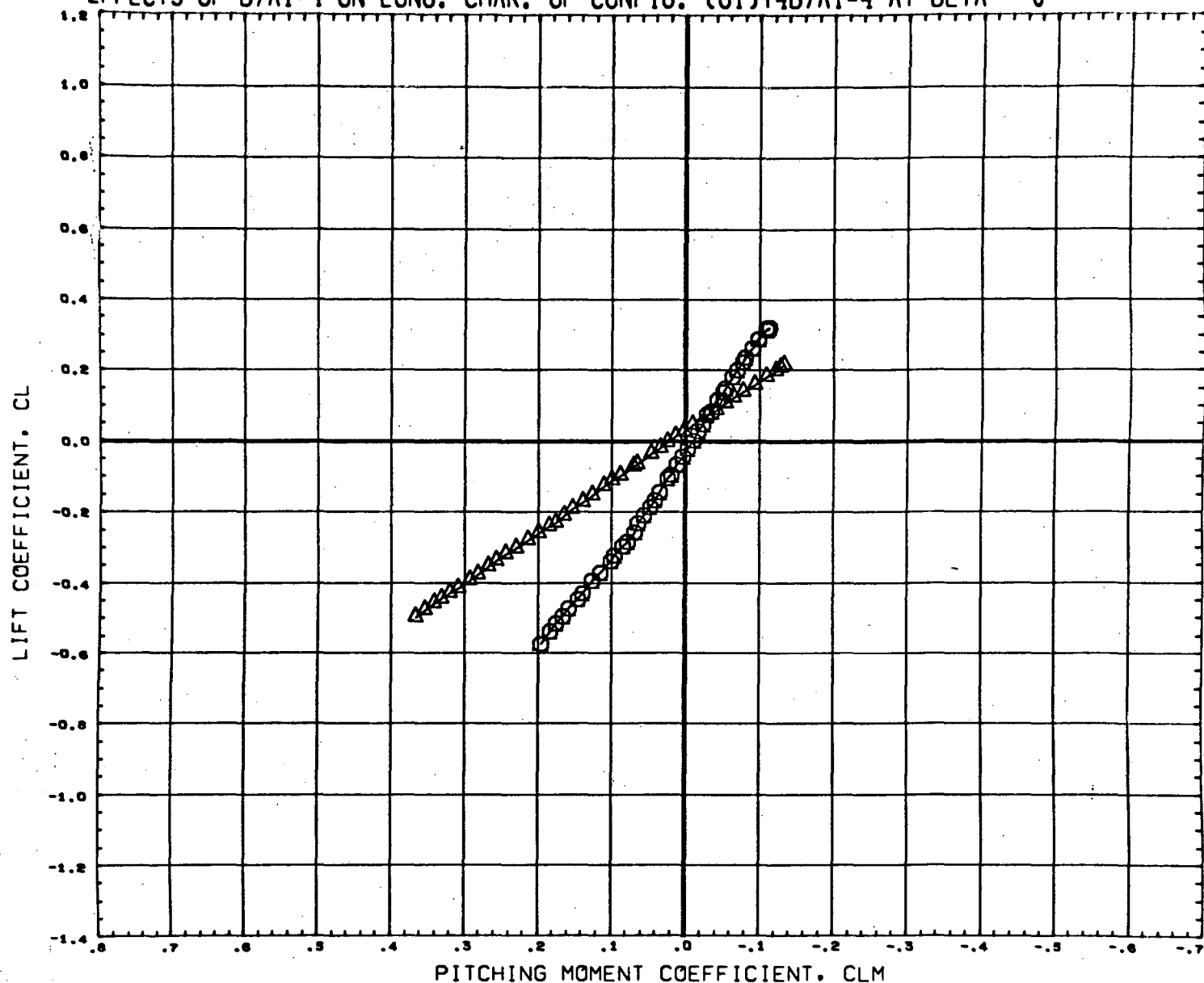
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0080 | SCALE |

MACH 4.47

PAGE 480

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (O1)T4B7A1-4 AT BETA = 0



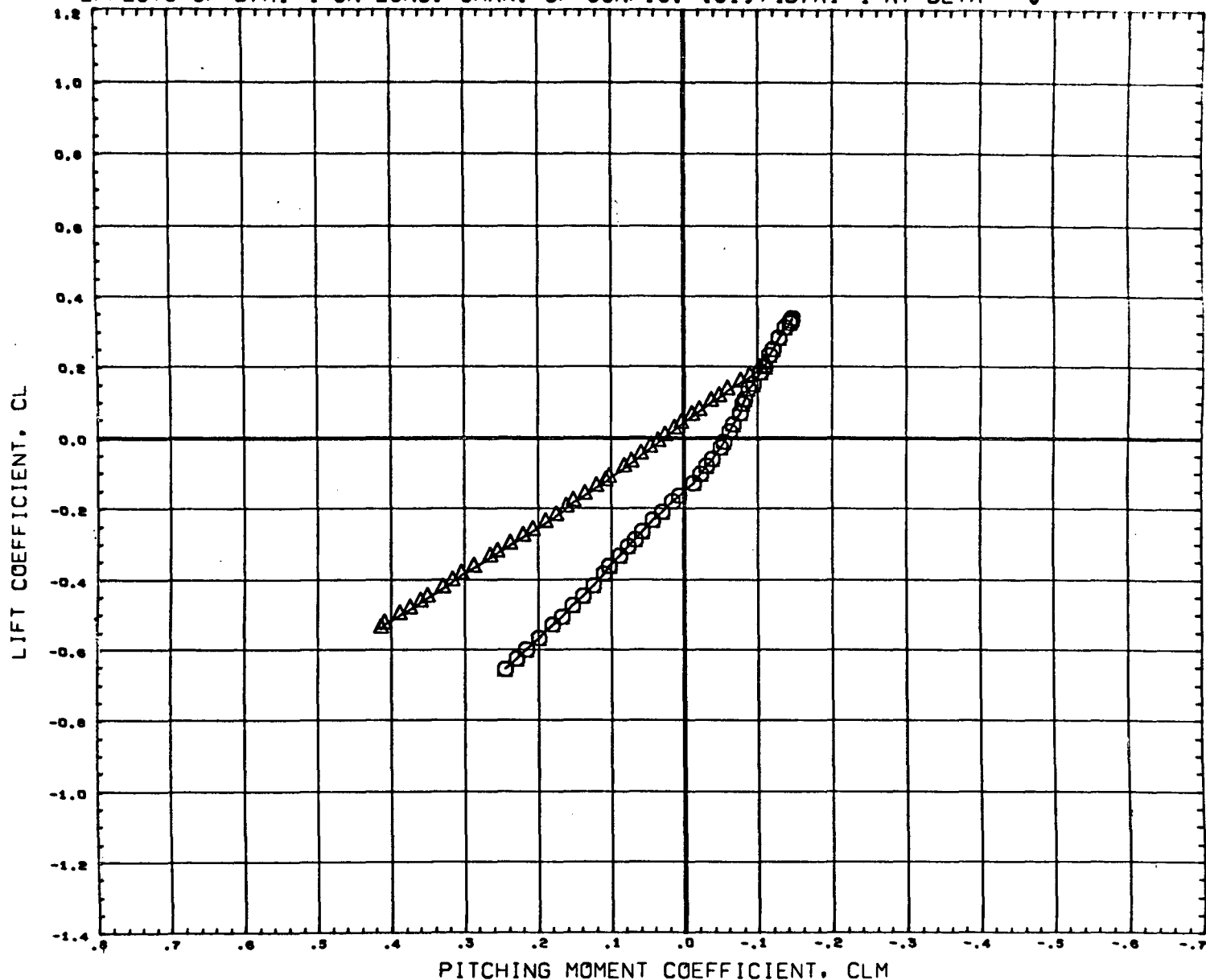
DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74C7) MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4
 (CD74D9) MDAC S-222 COMPOSITE(T-CG) (O1)T4

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 862.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH .58

PAGE 481

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (O1)T4B7A1-4 AT BETA = 0



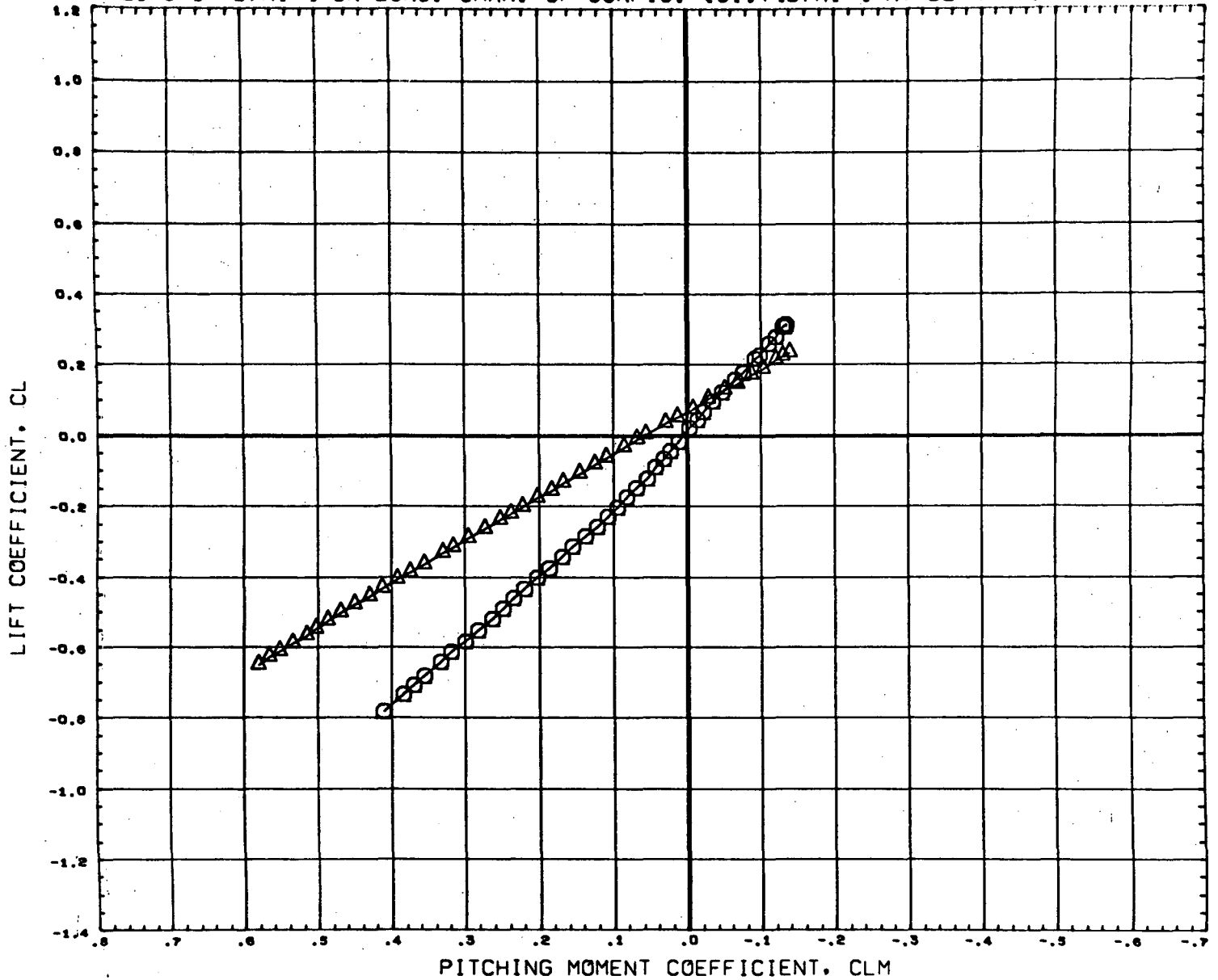
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4 |
| (CD74D9) | MDAC S-222 COMPOSITE (T-CG) (O1)T4 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 862.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH .90

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EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0

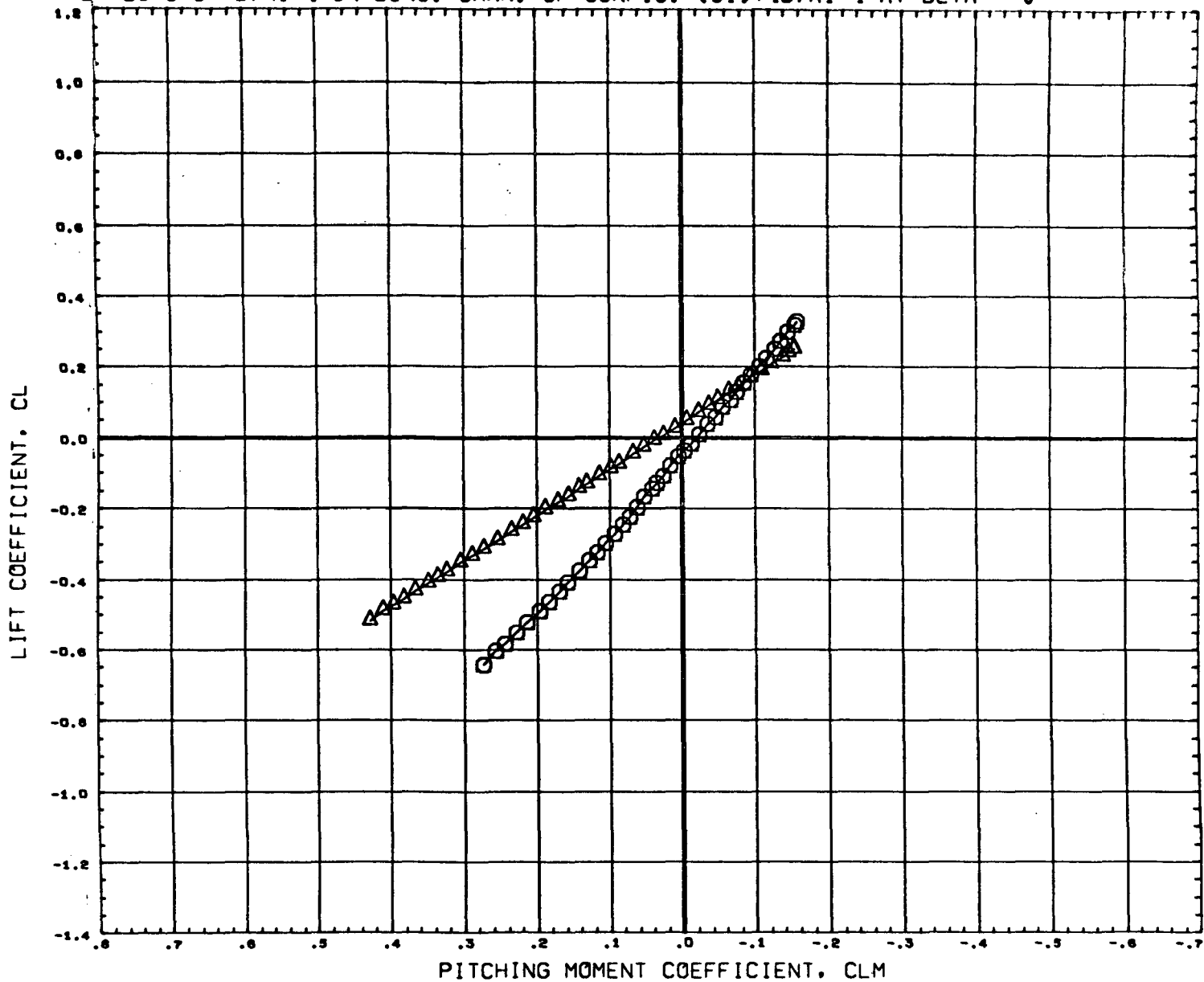


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|-------------------|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ. FT. |
| (CD74D9) | MDAC S-222 COMPOSITE (T-CG) (01)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 862.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

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EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0

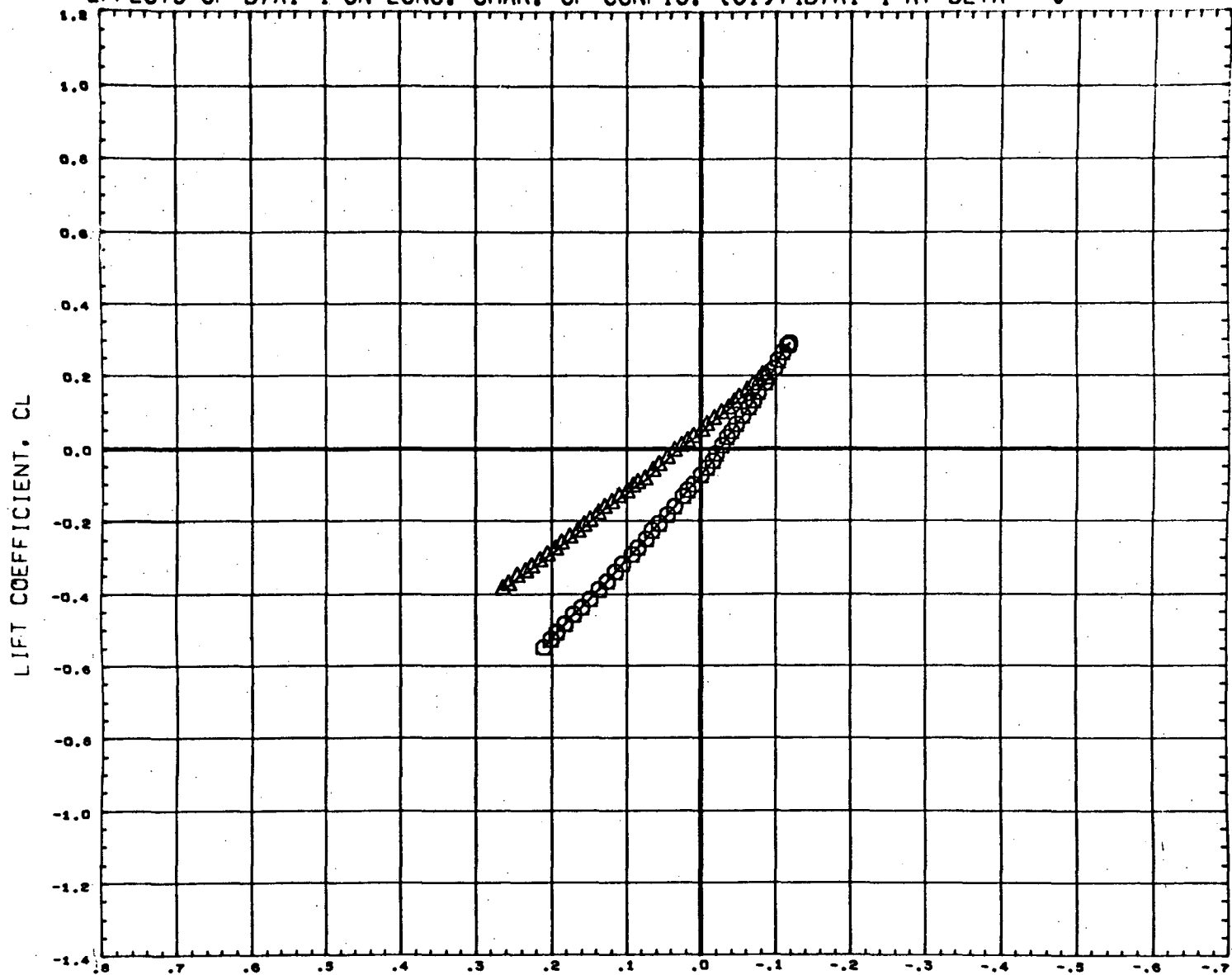


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D9) | MDAC S-222 COMPOSITE (T-CG) (01)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.51

PAGE 484

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0

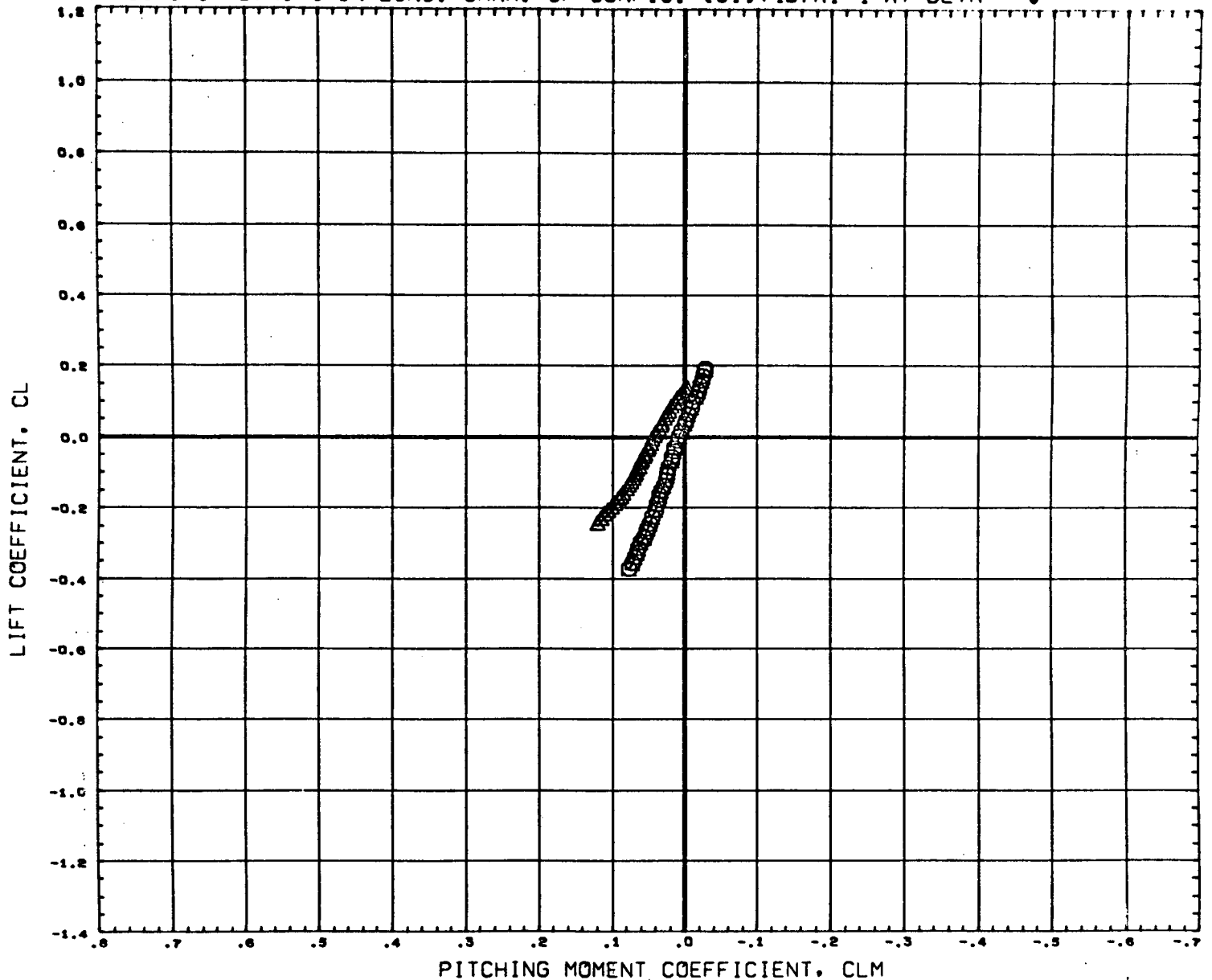


| DATA SET | SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|----------|--------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | ○ | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 90.FT. |
| (CD74D9) | △ | MDAC S-222 COMPOSITE(T-CG) (01)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | | BREF | 882.0004 IN. |
| | | | | | | | XMRP | 557.0004 IN. |
| | | | | | | | YMRP | 0.0000 IN. |
| | | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

PAGE 485

EFFECTS OF B7A1-4 ON LONG. CHAR. OF CONFIG. (01)T4B7A1-4 AT BETA = 0

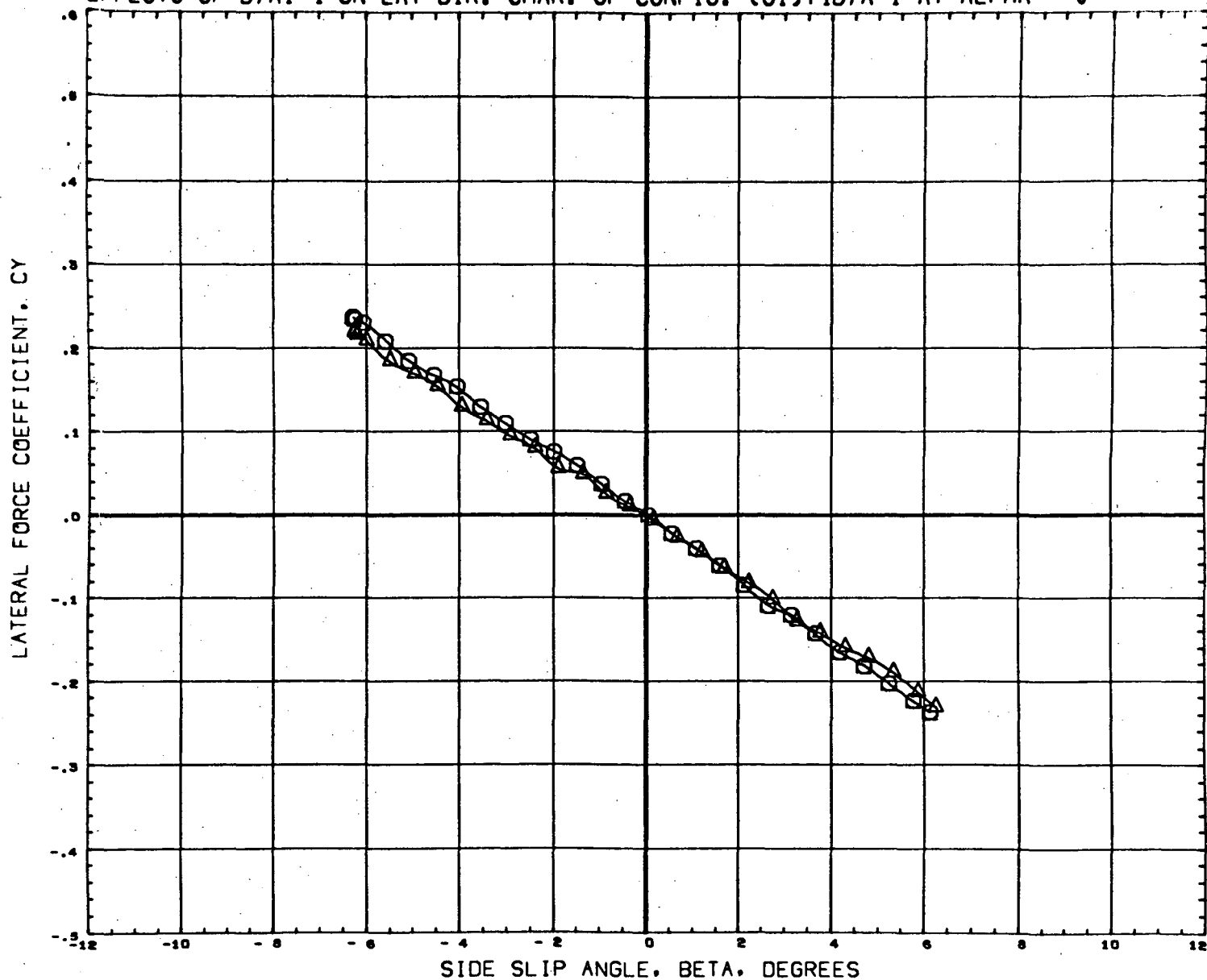


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74D9) | MDAC S-222 COMPOSITE(T-CG) (01)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

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EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (01)T4B7A-1 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (TD74C8) ○ MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (RD74E1) △ MDAC S-222 COMPOSITE(T-CG) (01)T4

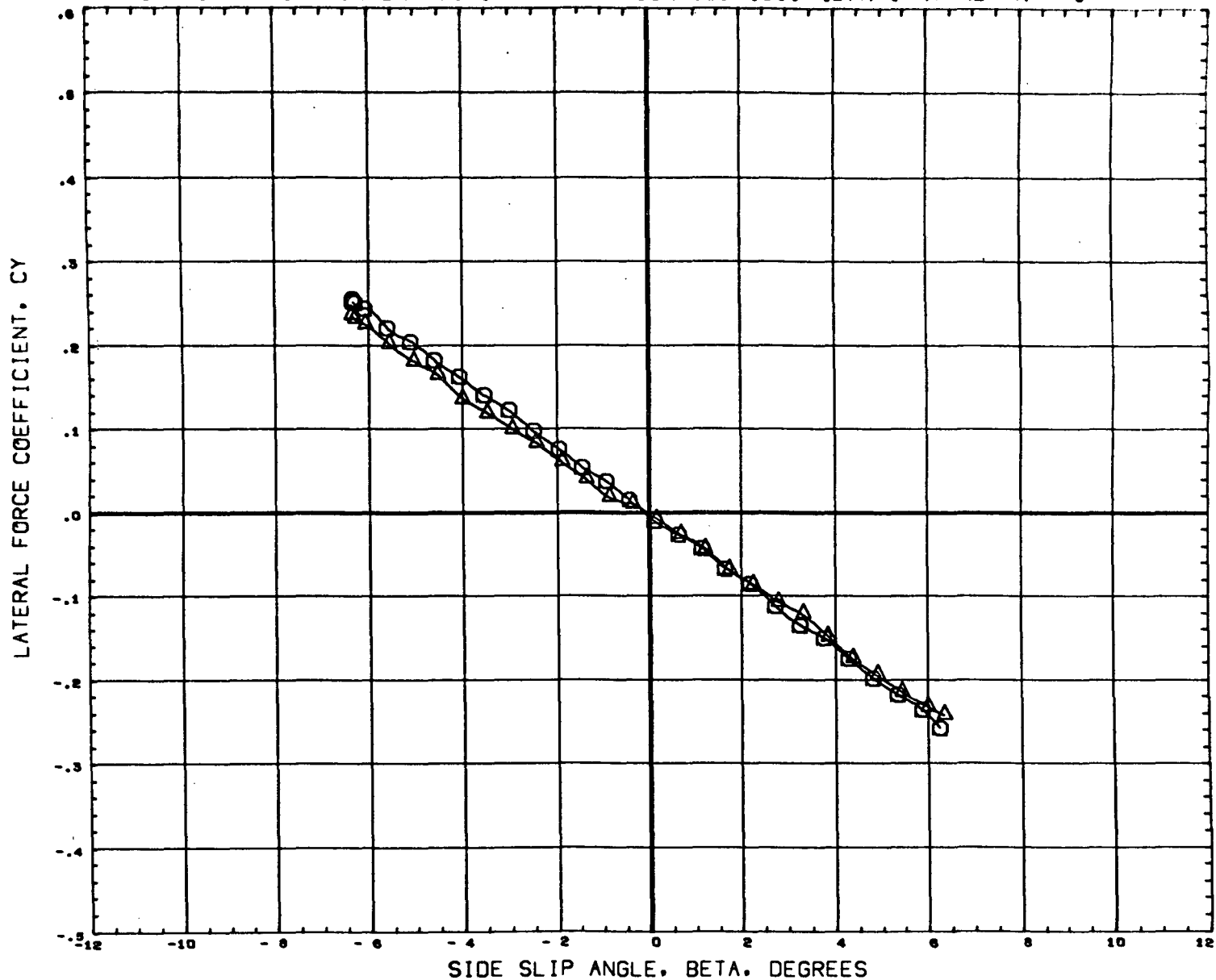
| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 862.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH .58

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EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (01)T4B7A-1 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (TD74C8) \bigcirc MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (RD74E1) \triangle MDAC S-222 COMPOSITE(T-CG) (01)T4

| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

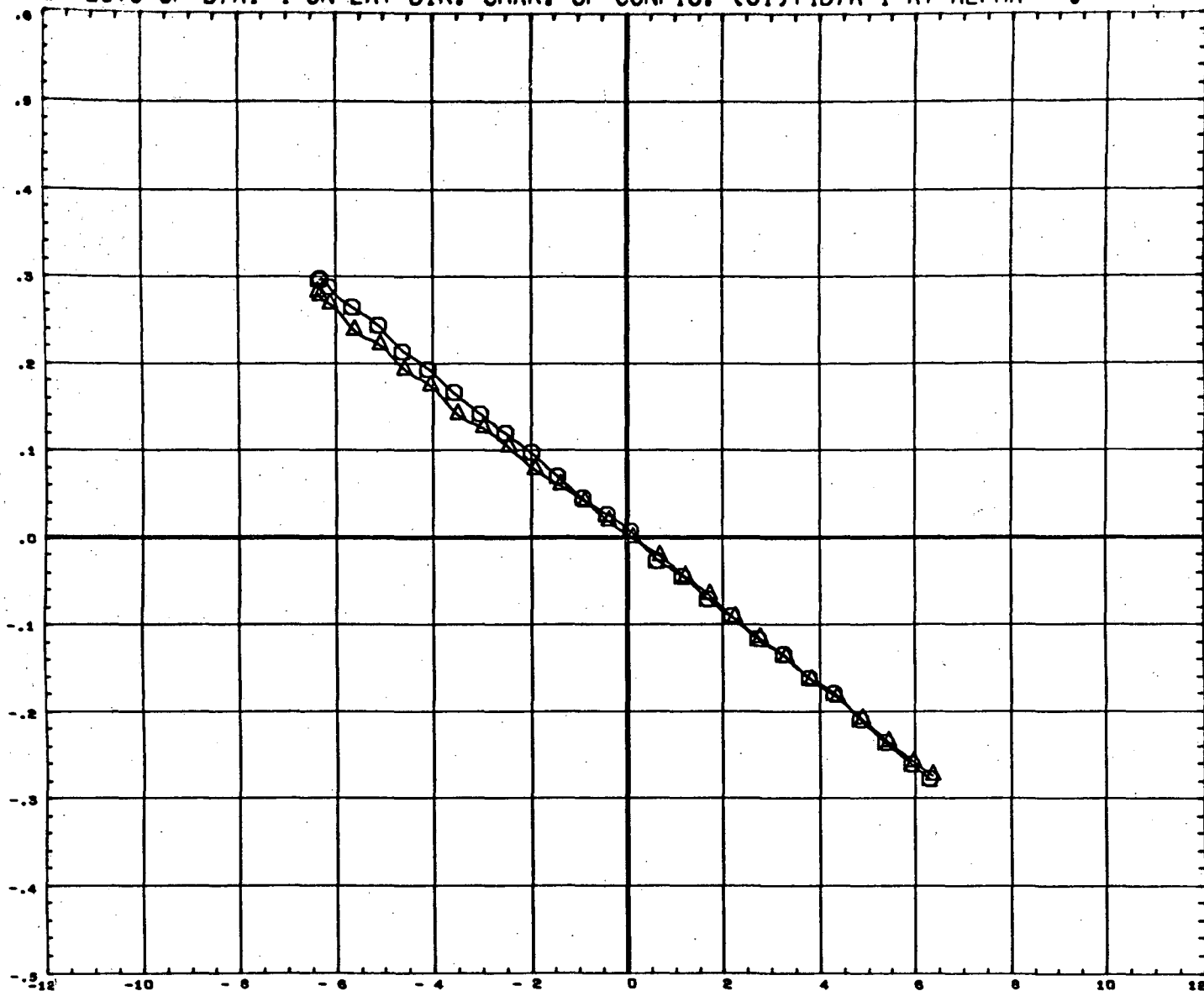
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH .90

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EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (01)T4B7A-1 AT ALPHA = 0

LATERAL FORCE COEFFICIENT, CY



SIDE SLIP ANGLE, BETA, DEGREES

DATA SET SYMBOL CONFIGURATION DESCRIPTION

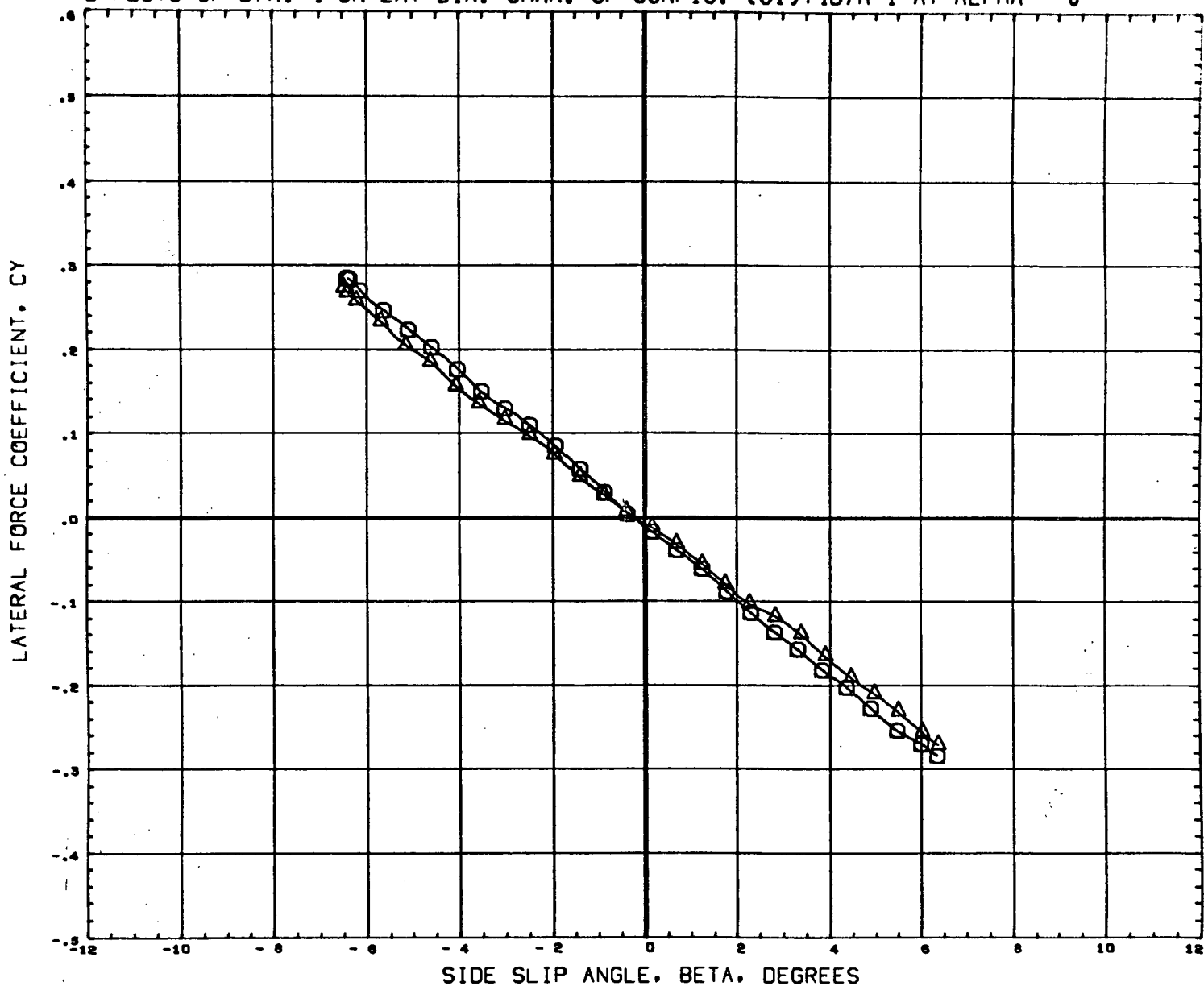
(TD74C8)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
(RD74E1)  MDAC S-222 COMPOSITE (T-CG) (01)T4

| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-------|--------|--------|--------|-----------------------|-----------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | BREF | 682.0004 | IN. |
| | | | | XMRP | 557.0004 | IN. |
| | | | | YMRP | 0.0000 | IN. |
| | | | | ZMRP | 200.0004 | IN. |
| | | | | SCALE | 0.0060 | SCALE |

MACH 1.08

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EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (01)T4B7A-1 AT ALPHA = 0



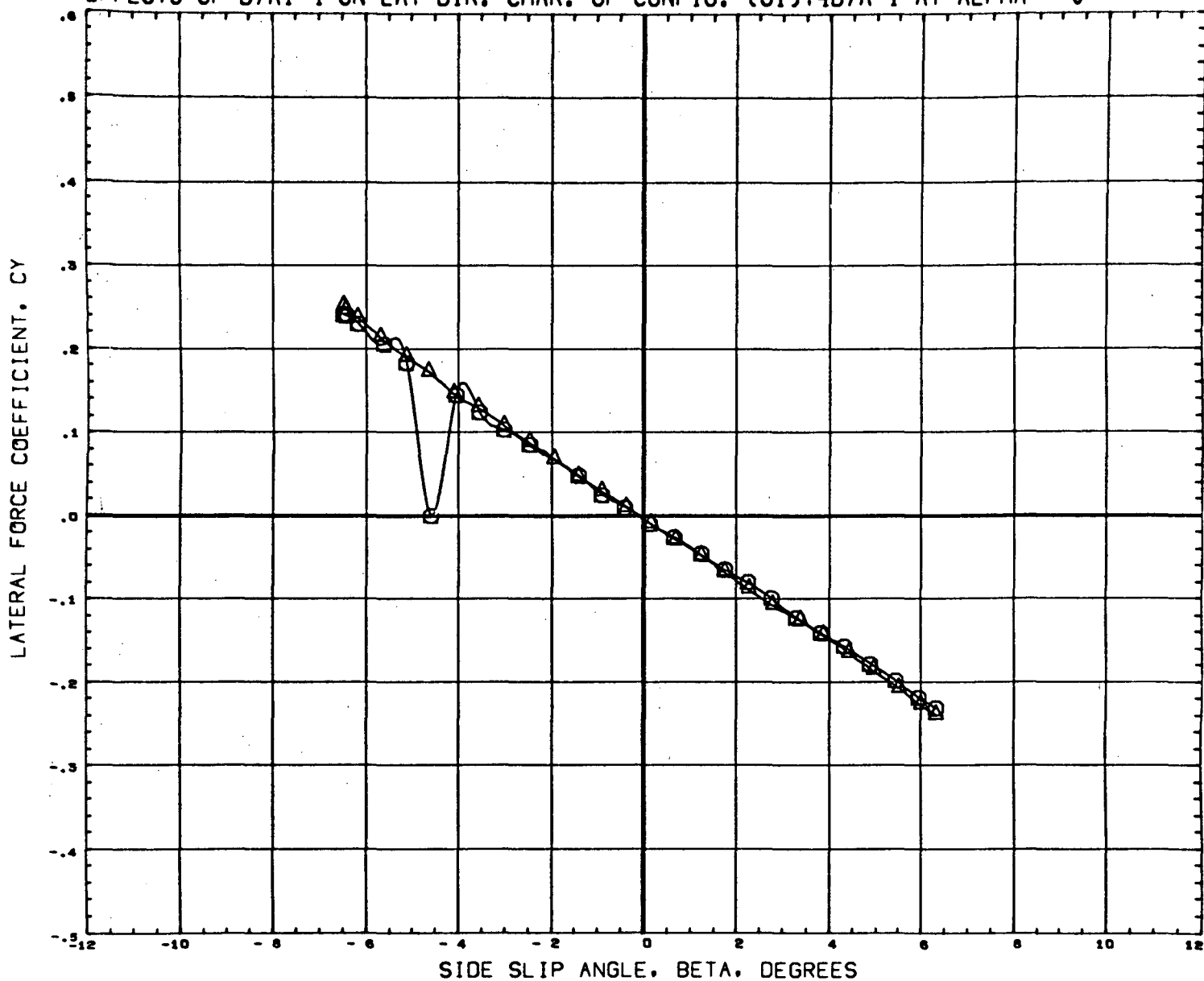
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|----------------------|---|
| (TD74C9) \circ | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (RD74E1) \triangle | MDAC S-222 COMPOSITE(T-CG) (01)T4 |

| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 1.51

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EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (01)T4B7A-1 AT ALPHA = 0



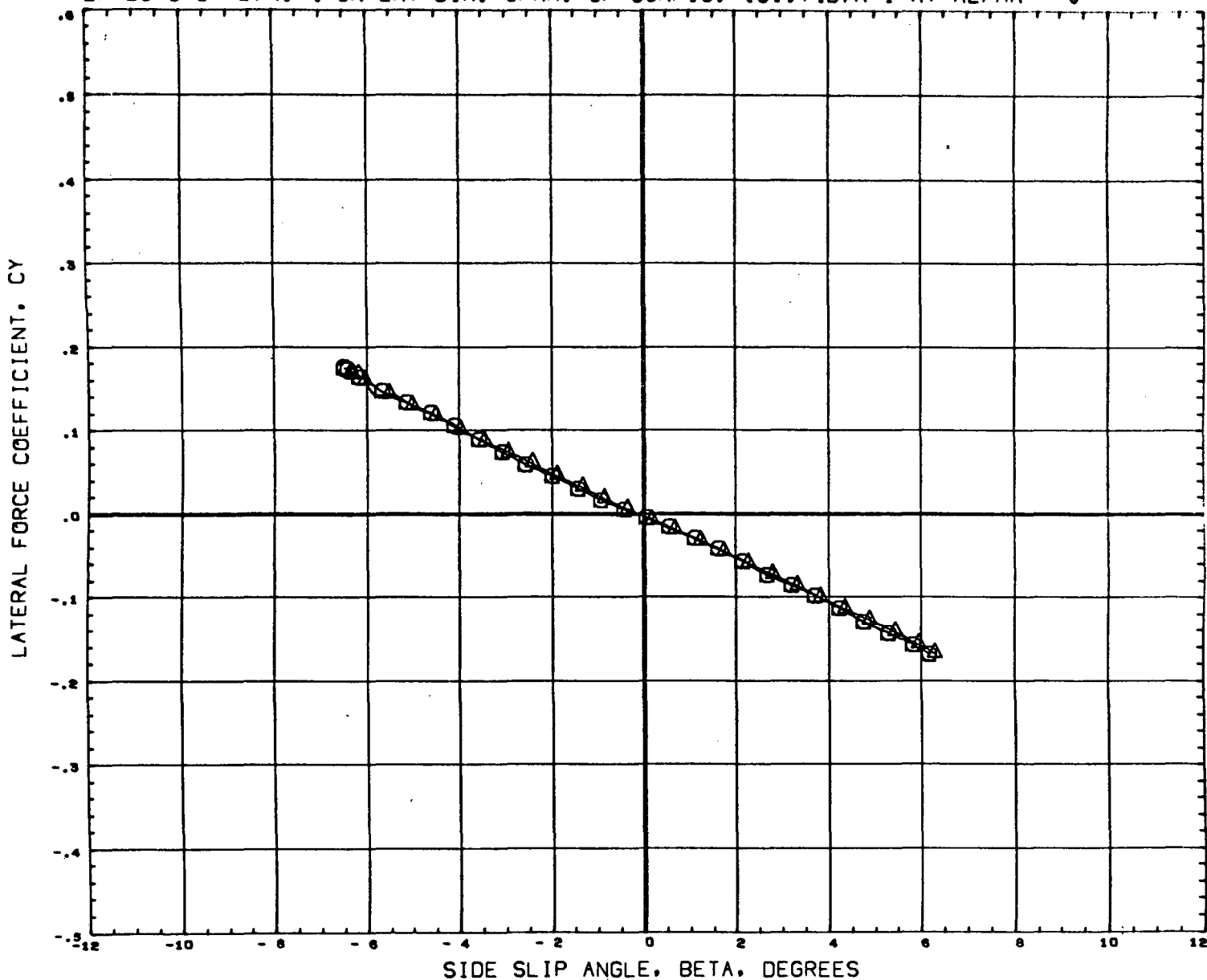
DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (TD74C8) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (RD74E1) MDAC S-222 COMPOSITE(T-CG) (01)T4

| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 862.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 2.20

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EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (O1)T4B7A-1 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C8) MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4
(RD74E1) MDAC S-222 COMPOSITE(T-CG) (O1)T4

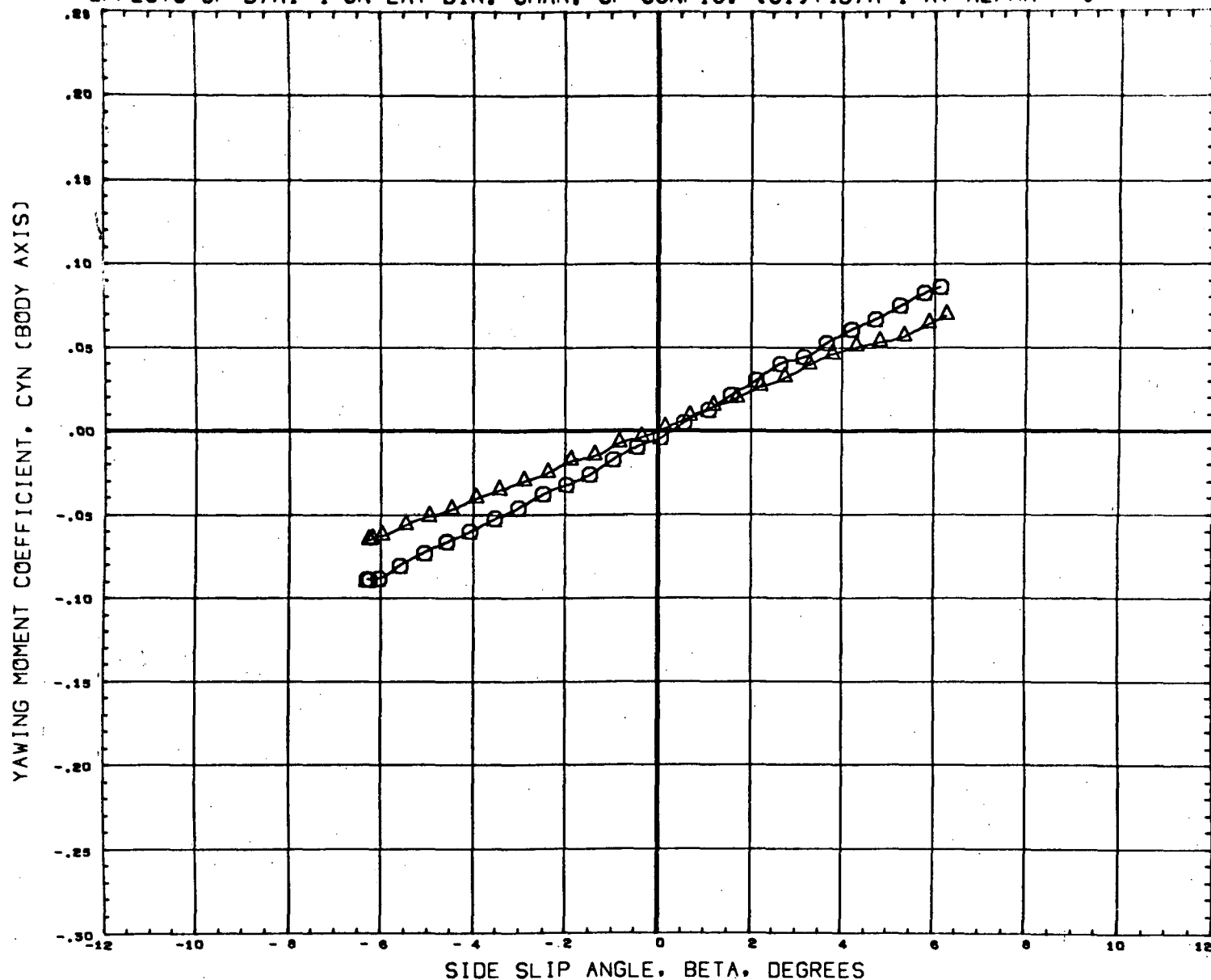
| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 4.47

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EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (01)T4B7A-1 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (TD74C8) (01) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
 (RD74E1) (01) MDAC S-222 COMPOSITE (T-CG) (01)T4

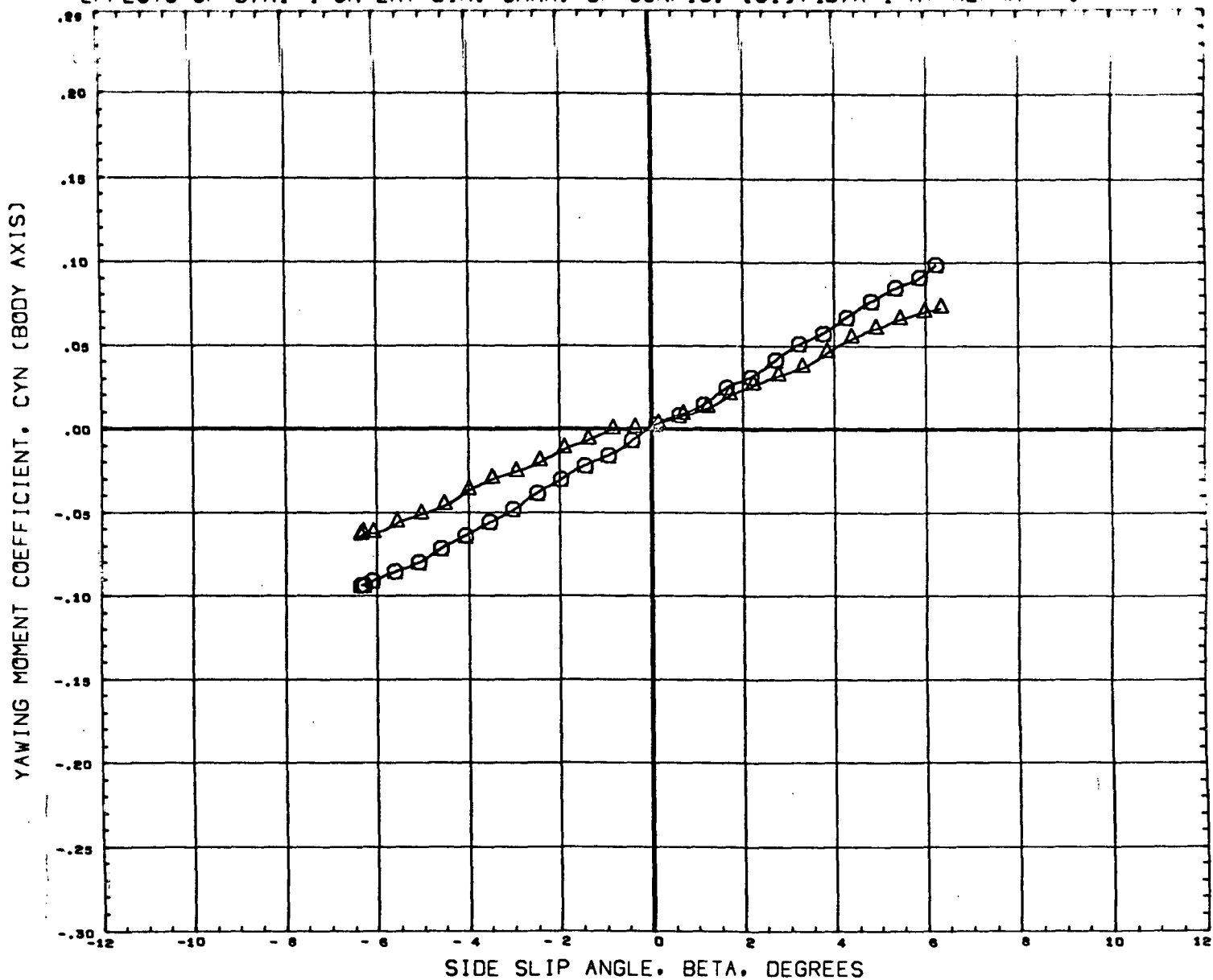
ALPHA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.3004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH .58

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EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (01)T4B7A-1 AT ALPHA = 0

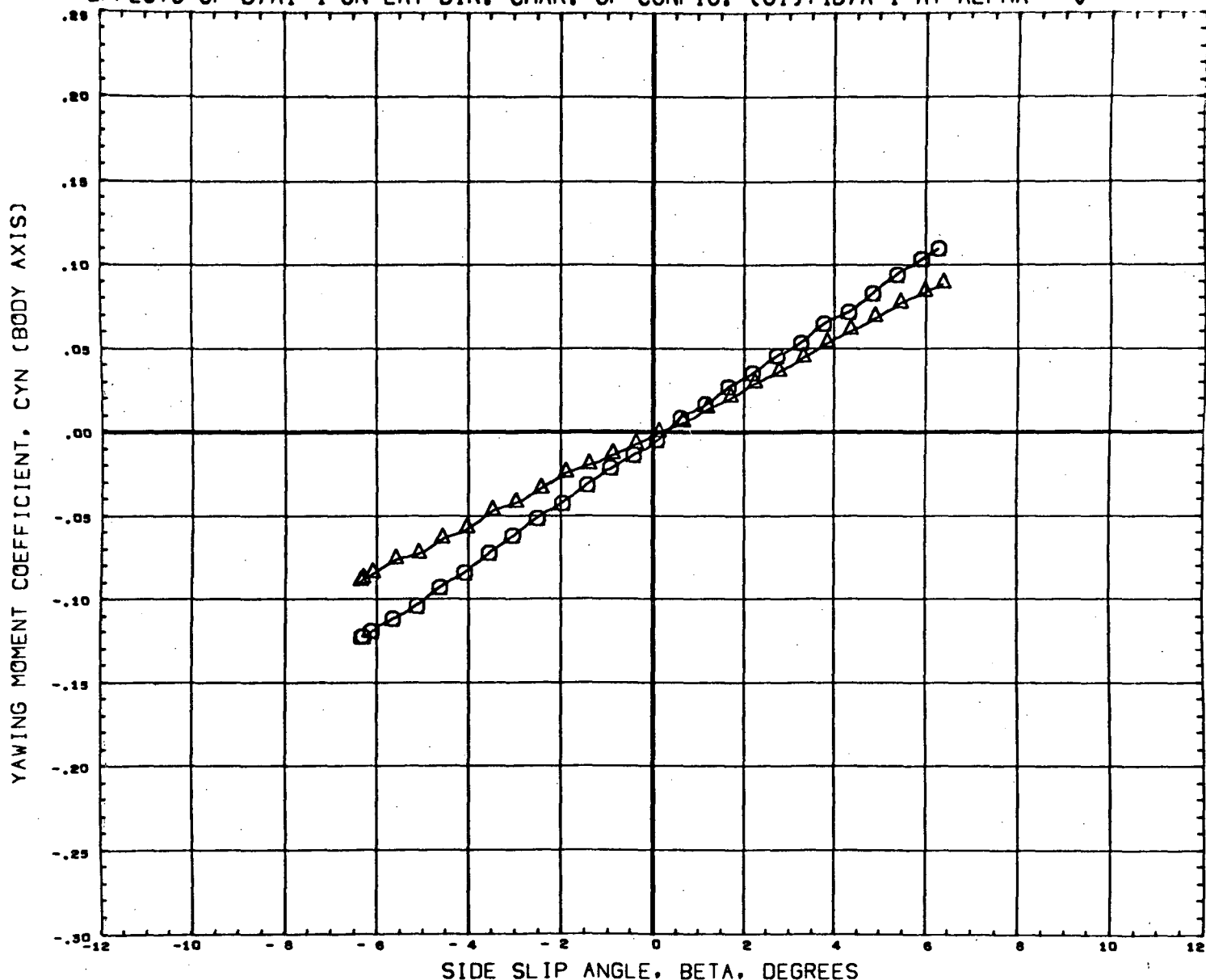


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74E1) | MDAC S-222 COMPOSITE(T-CG) (01)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

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EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (01)T4B7A-1 AT ALPHA = 0

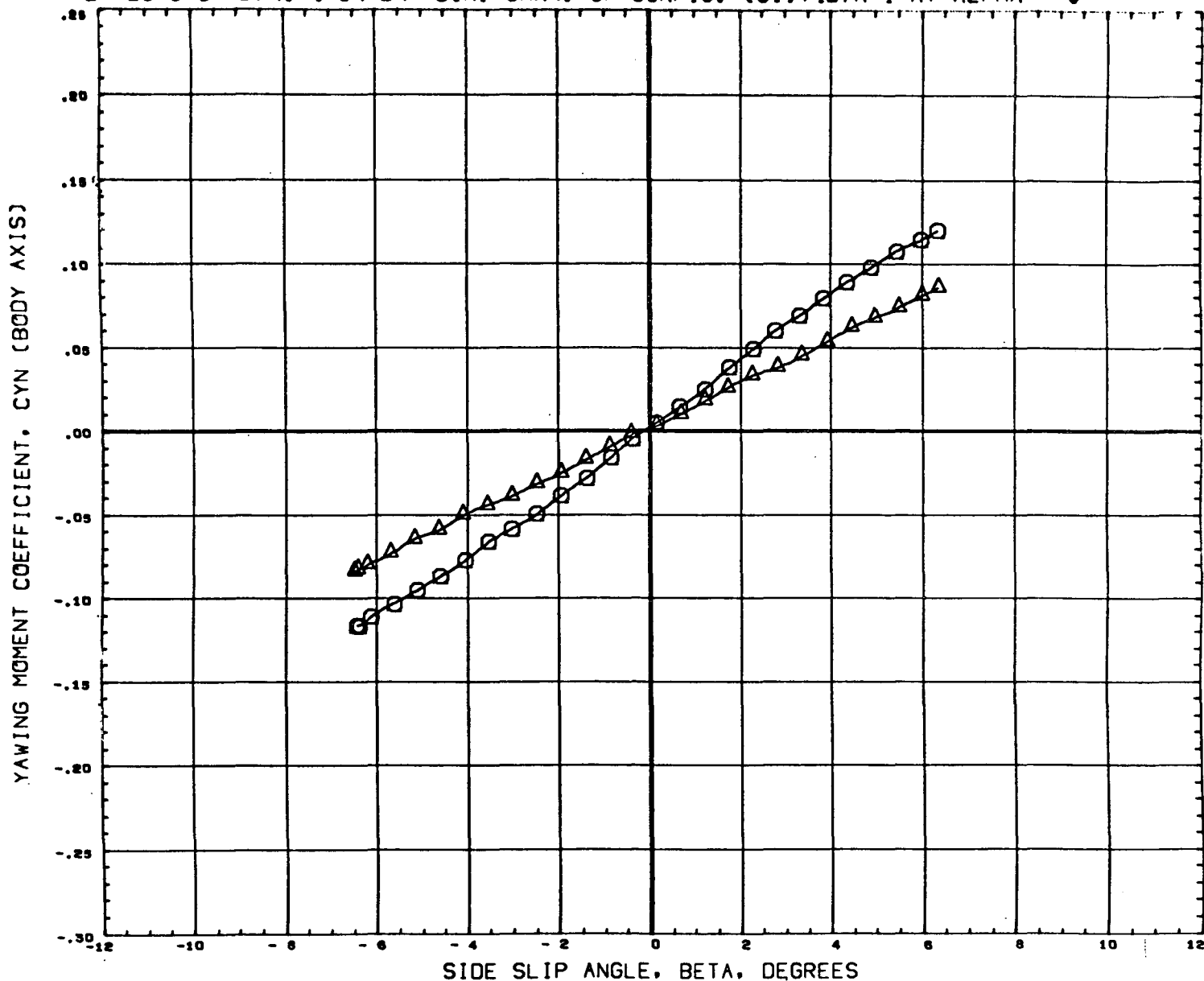


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74E1) | MDAC S-222 COMPOSITE(T-CG) (01)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

PAGE 495

EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (01)T4B7A-1 AT ALPHA = 0

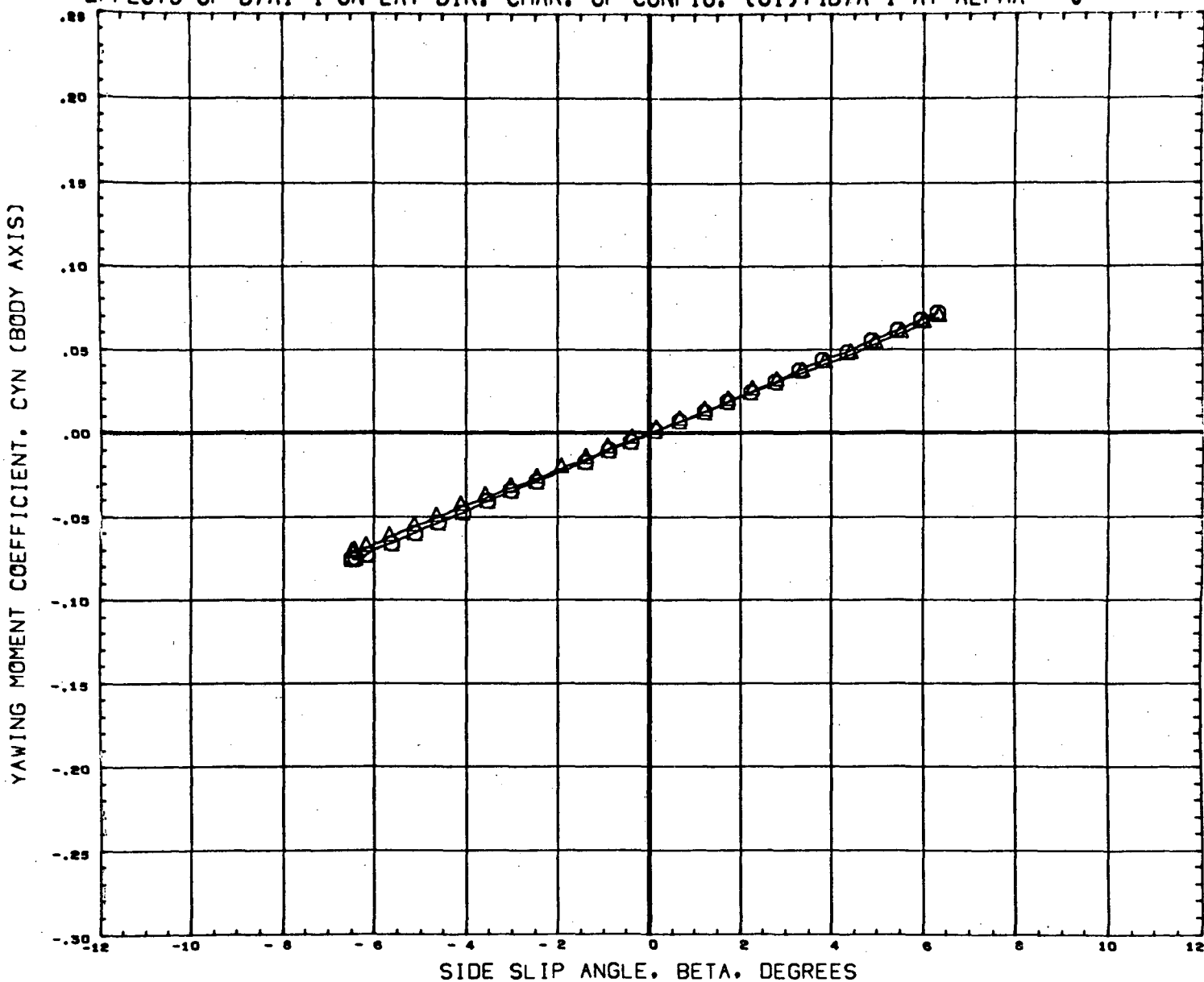


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (RD74E10) | MDAC S-222 COMPOSITE(T-CG) (01)T4 |

| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | |
|-----------------------|------------------|
| SREF | 3155.3040 SQ.FT. |
| LREF | 609.5004 IN. |
| BREF | 882.0004 IN. |
| XMRP | 537.0004 IN. |
| YMRP | 0.0000 IN. |
| ZMRP | 200.0004 IN. |
| SCALE | 0.0060 SCALE |

EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (01)T4B7A-1 AT ALPHA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (RD74E1) | MDAC S-222 COMPOSITE(T-CG) (01)T4 |

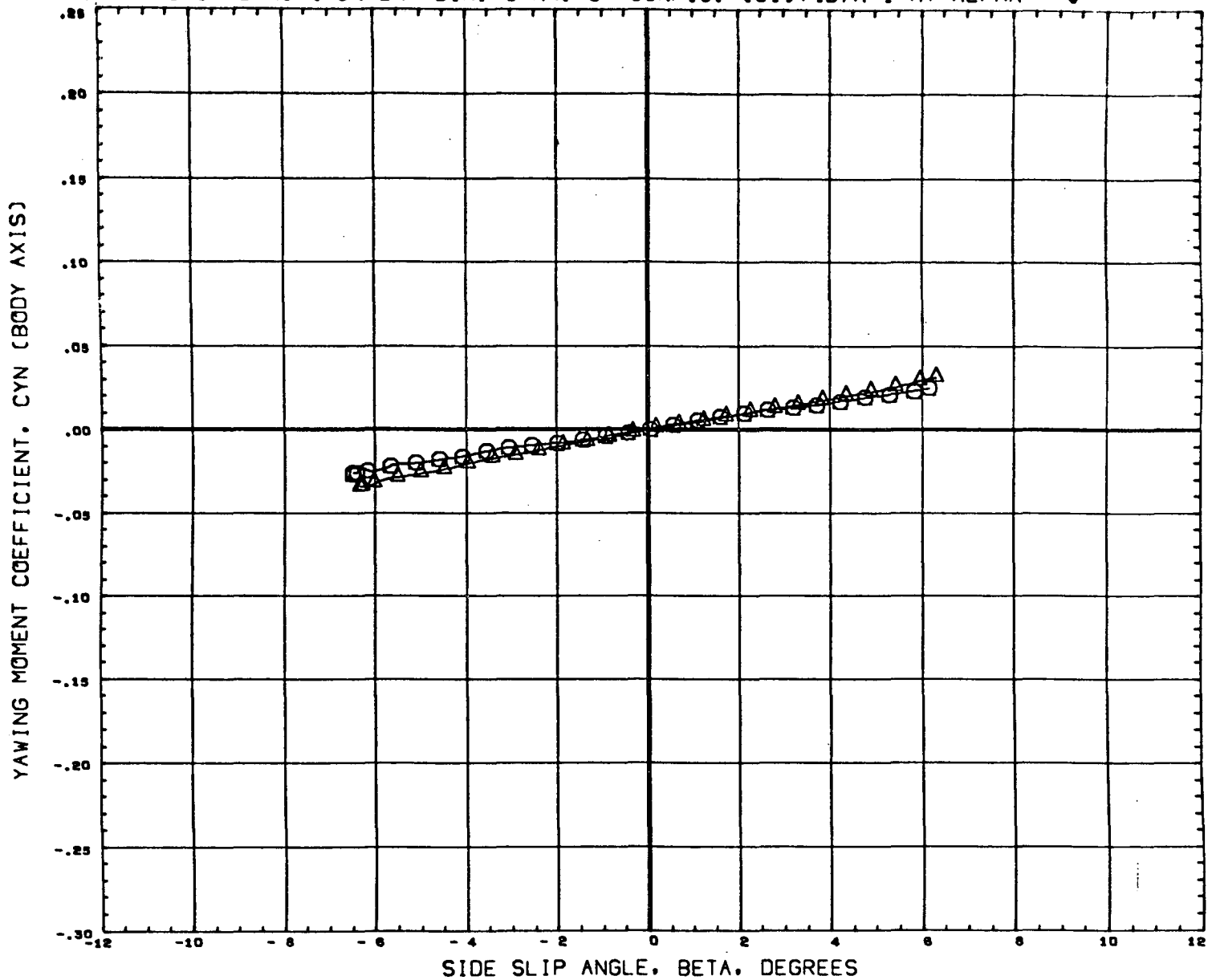
| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 982.0004 | IN. |
| XM RP | 557.0004 | IN. |
| YM RP | 0.0000 | IN. |
| ZM RP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 2.20

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EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (01)T4B7A-1 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (TD74C8) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (RD74E1) MDAC S-222 COMPOSITE(T-CG) (01)T4

| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

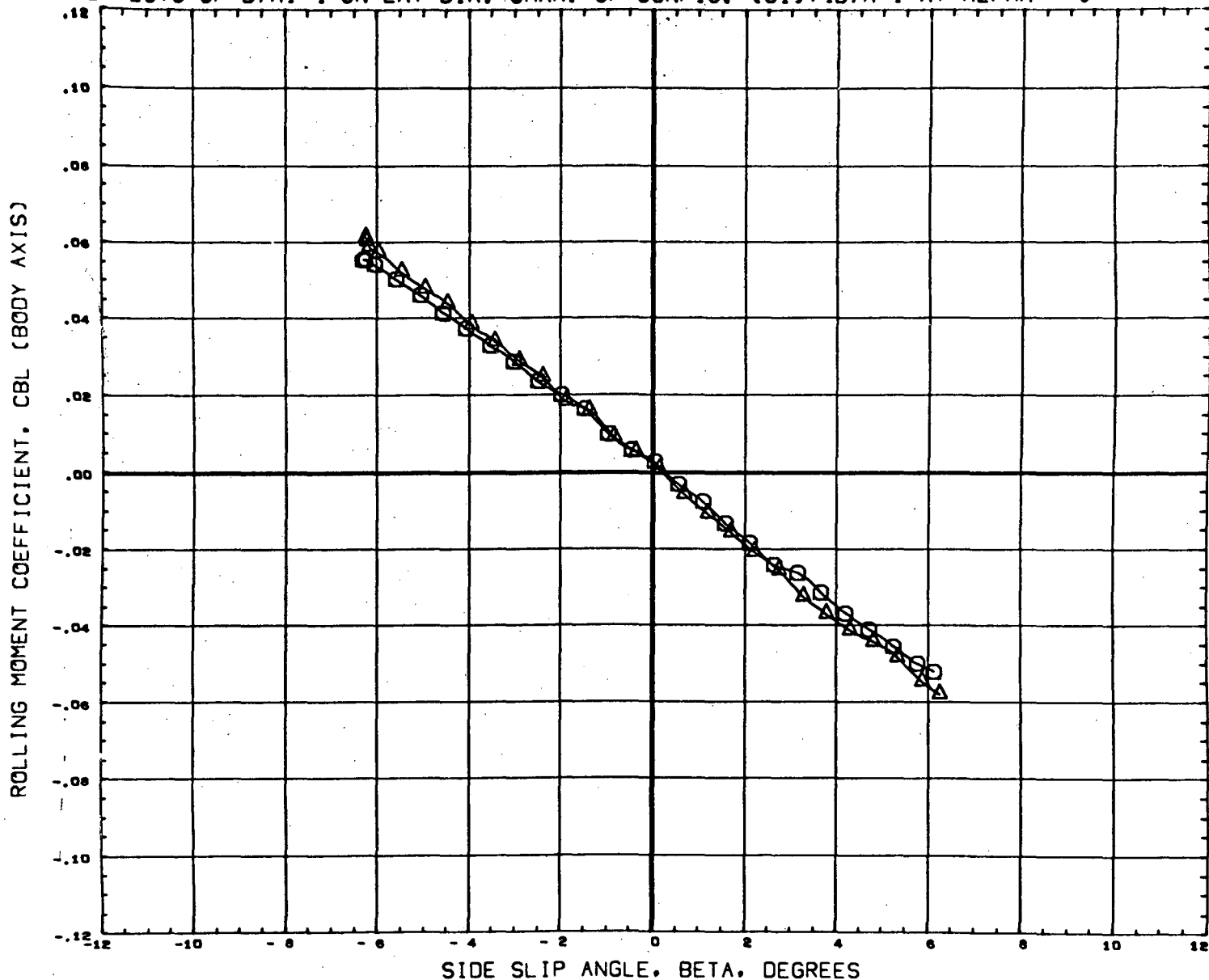
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH

4.47

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EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (01)T4B7A-1 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (T074C8) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (R074E1) MDAC S-222 COMPOSITE(T-CG) (01)T4

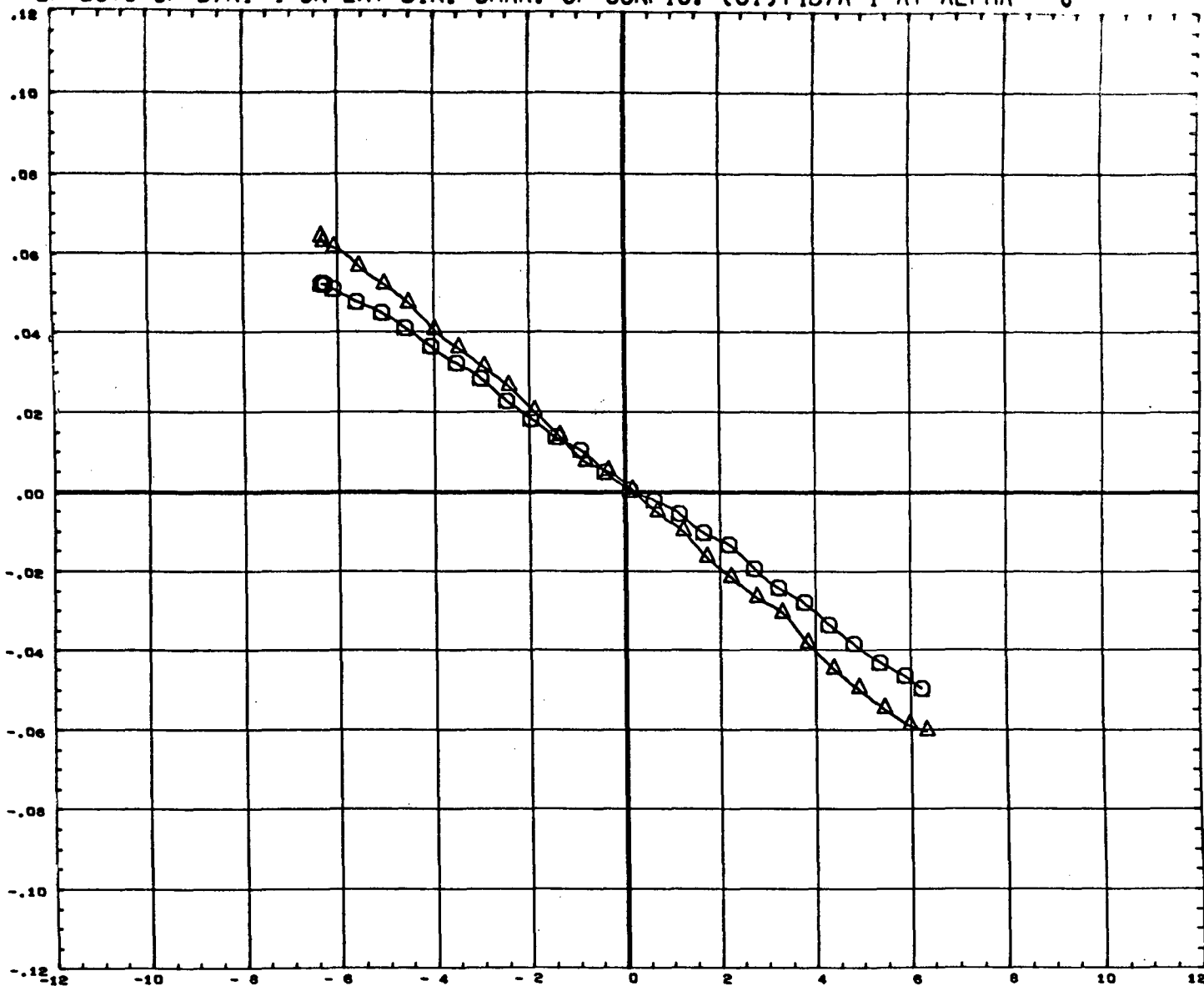
| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRR | 557.0004 IN. |
| | | | | YMRR | 0.0000 IN. |
| | | | | ZMRR | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH .58

PAGE 499

EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (01)T4B7A-1 AT ALPHA = 0

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



SIDE SLIP ANGLE, BETA, DEGREES

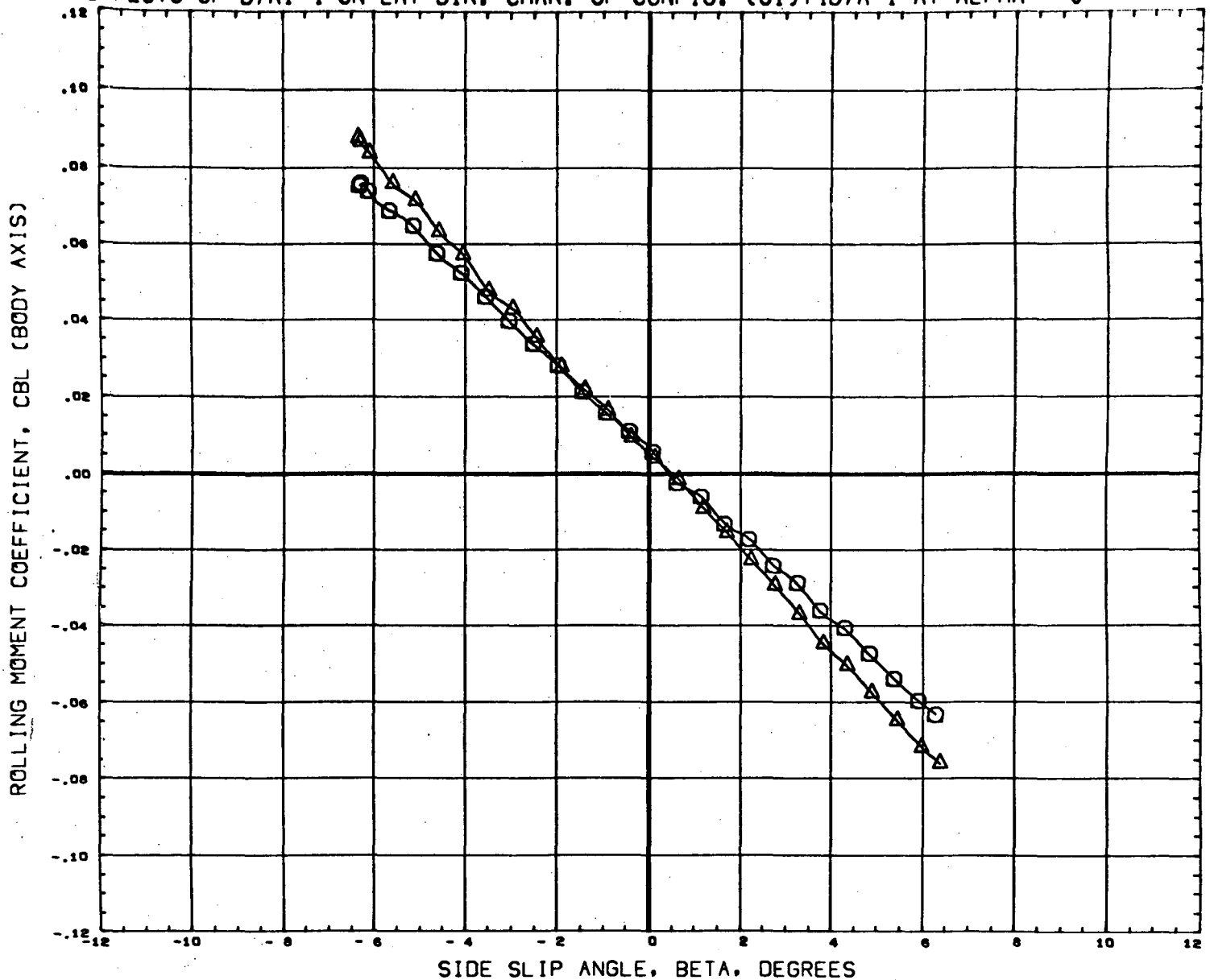
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | NDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74E1) | NDAC S-222 COMPOSITE(T-CG) (01)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH

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PAGE 500

EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (01)T4B7A-1 AT ALPHA = 0



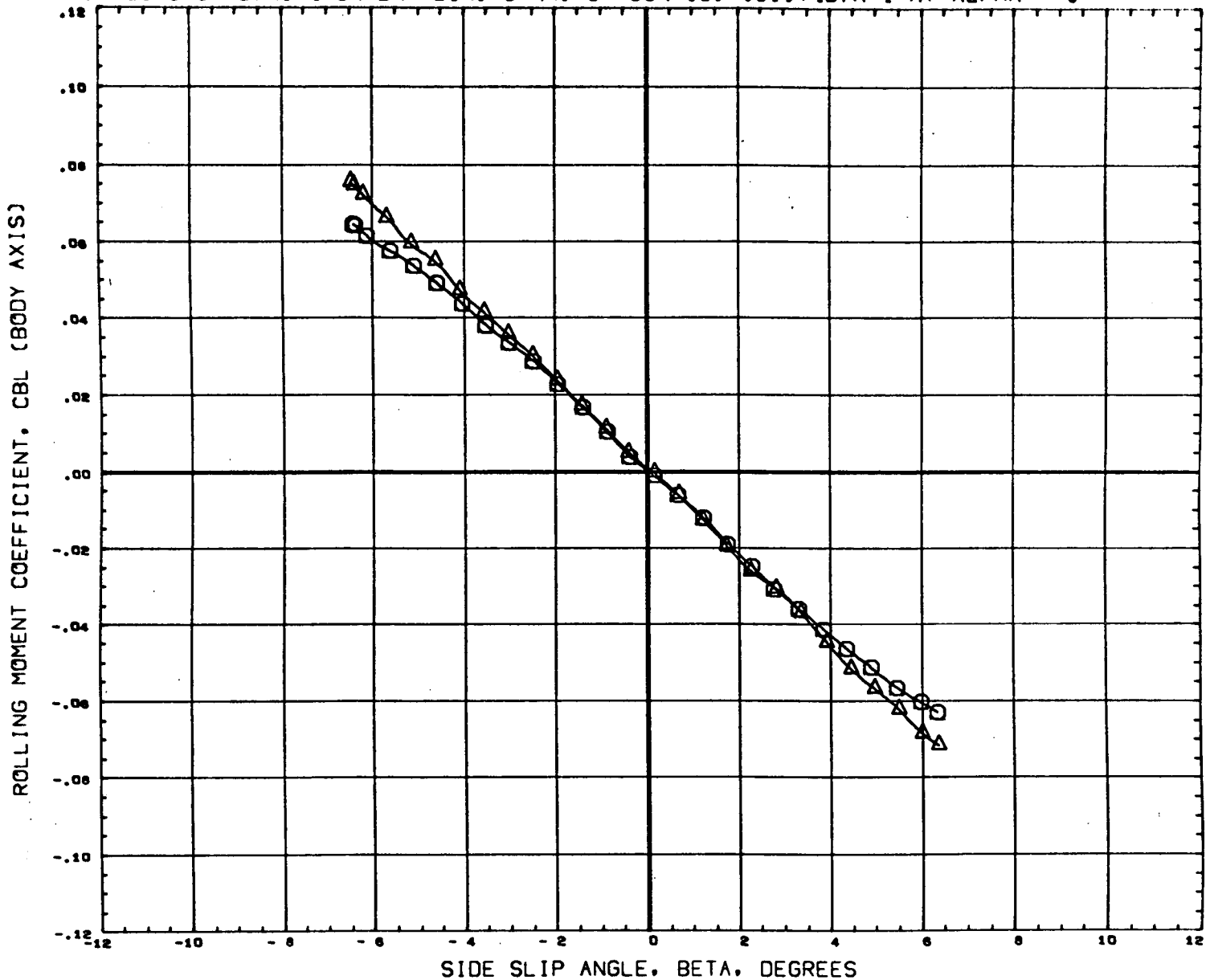
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (TD74C8) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (RD74E1) | MDAC S-222 COMPOSITE (T-CG) (01)T4 |

| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRF | 557.0004 IN. |
| | | | | YMRF | 0.0000 IN. |
| | | | | ZMRF | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 1.08

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EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (01)T4B7A-1 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (TD74C8) (01)T4B7A1-4
 (RD74E1) (01)T4

ALPHA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 0.000

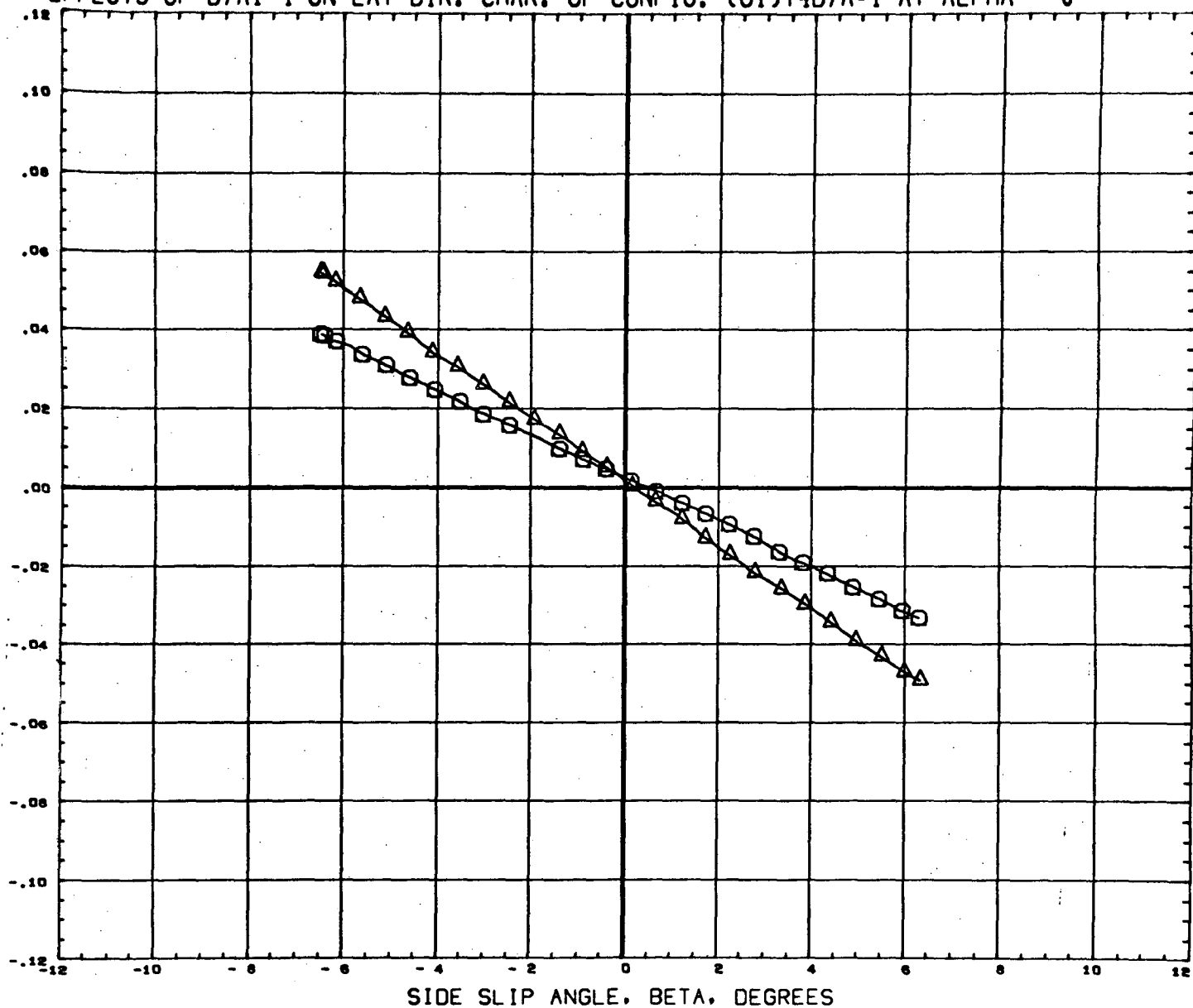
REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 892.0004 IN.
 XMRP 937.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH 1.51

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EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (01)T4B7A-1 AT ALPHA = 0

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



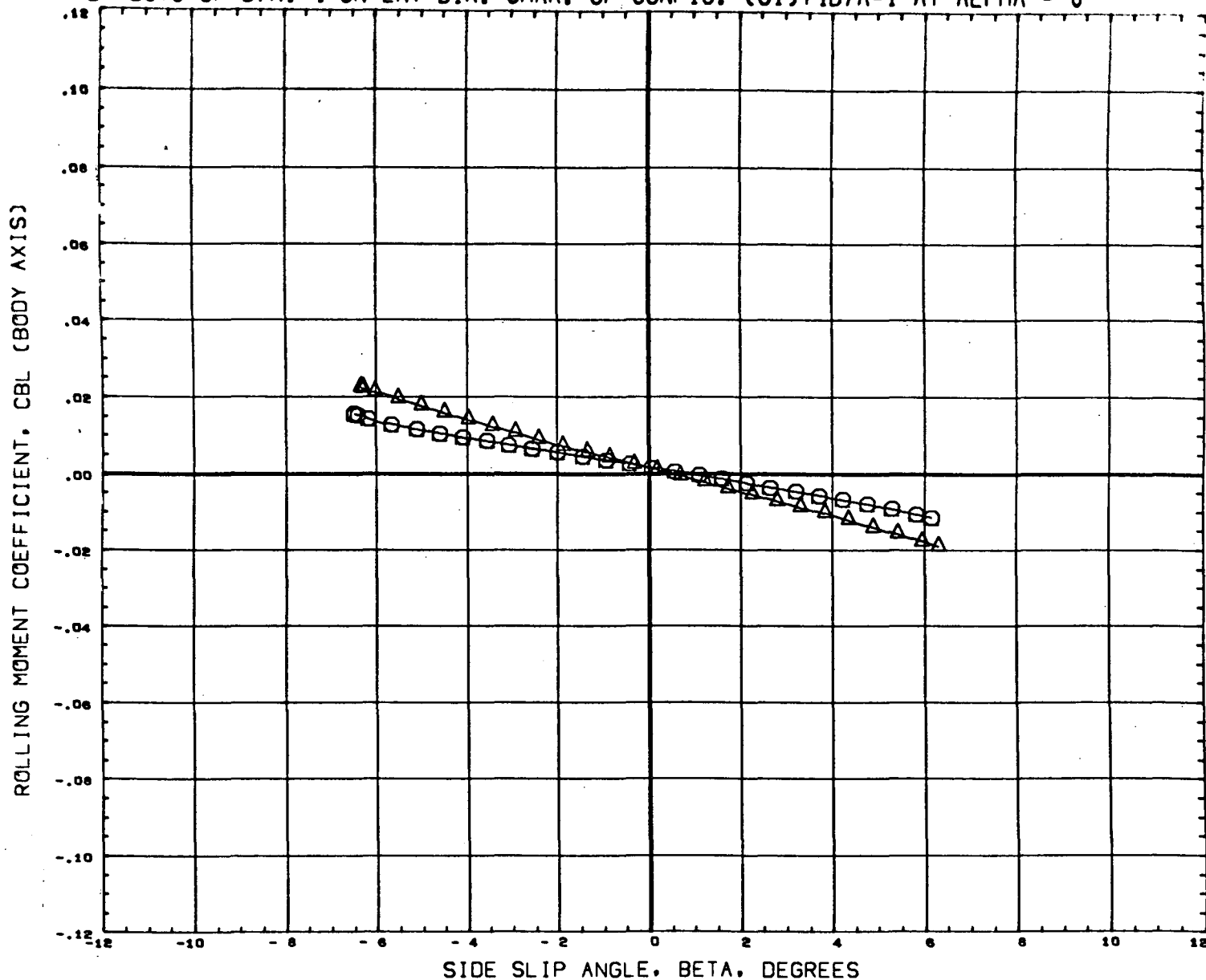
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (RD74E1) | MDAC S-222 COMPOSITE(T-CG) (01)T4 |

| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH 2.20

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EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (O1)T4B7A-1 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C6) (O) MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4
(RD74E1) (Δ) MDAC S-222 COMPOSITE (T-CG) (O1)T4

| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

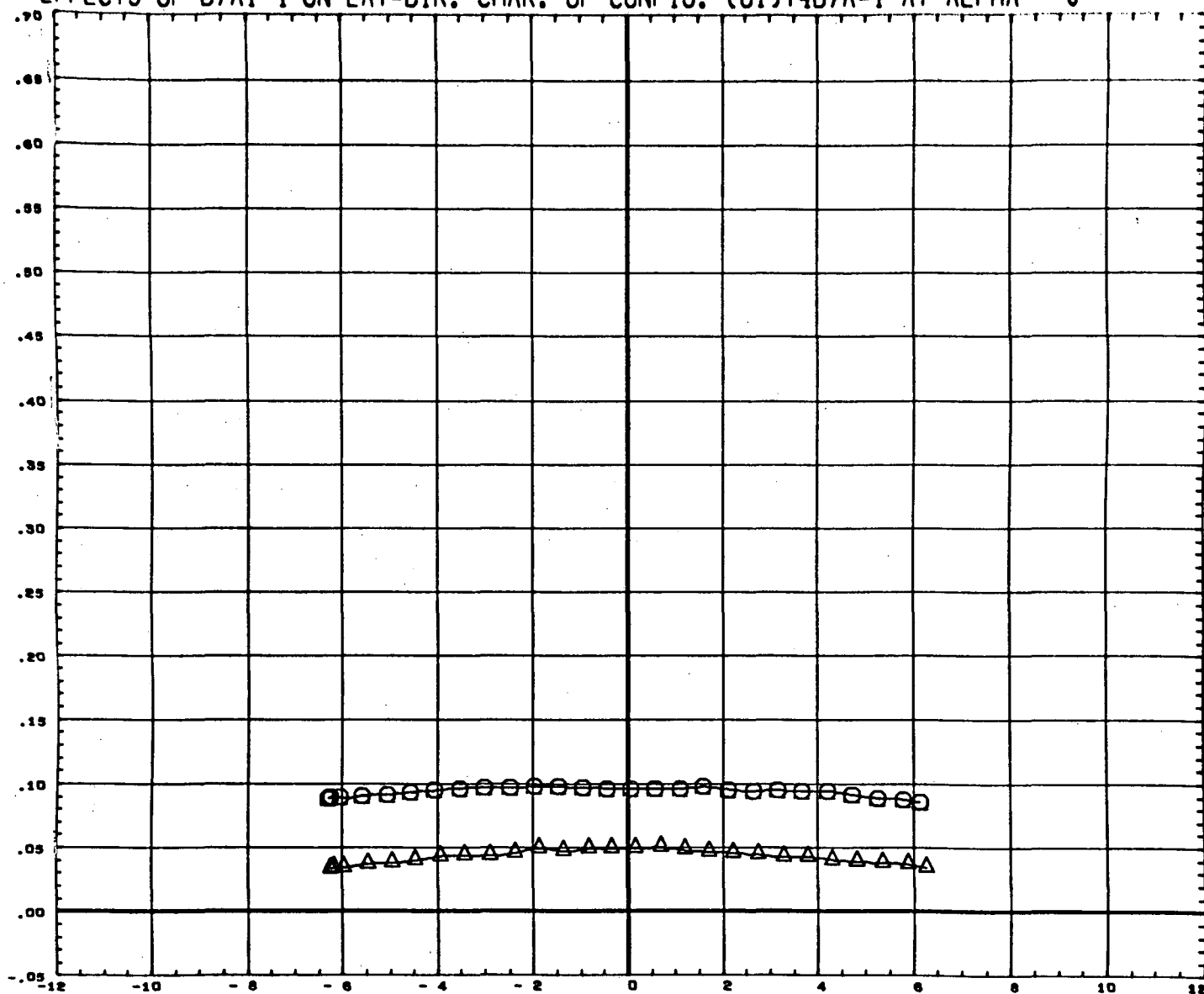
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRF | 557.0004 | IN. |
| YMRF | 0.0000 | IN. |
| ZMRF | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 4.47

PAGE 504

EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (O1)T4B7A-1 AT ALPHA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



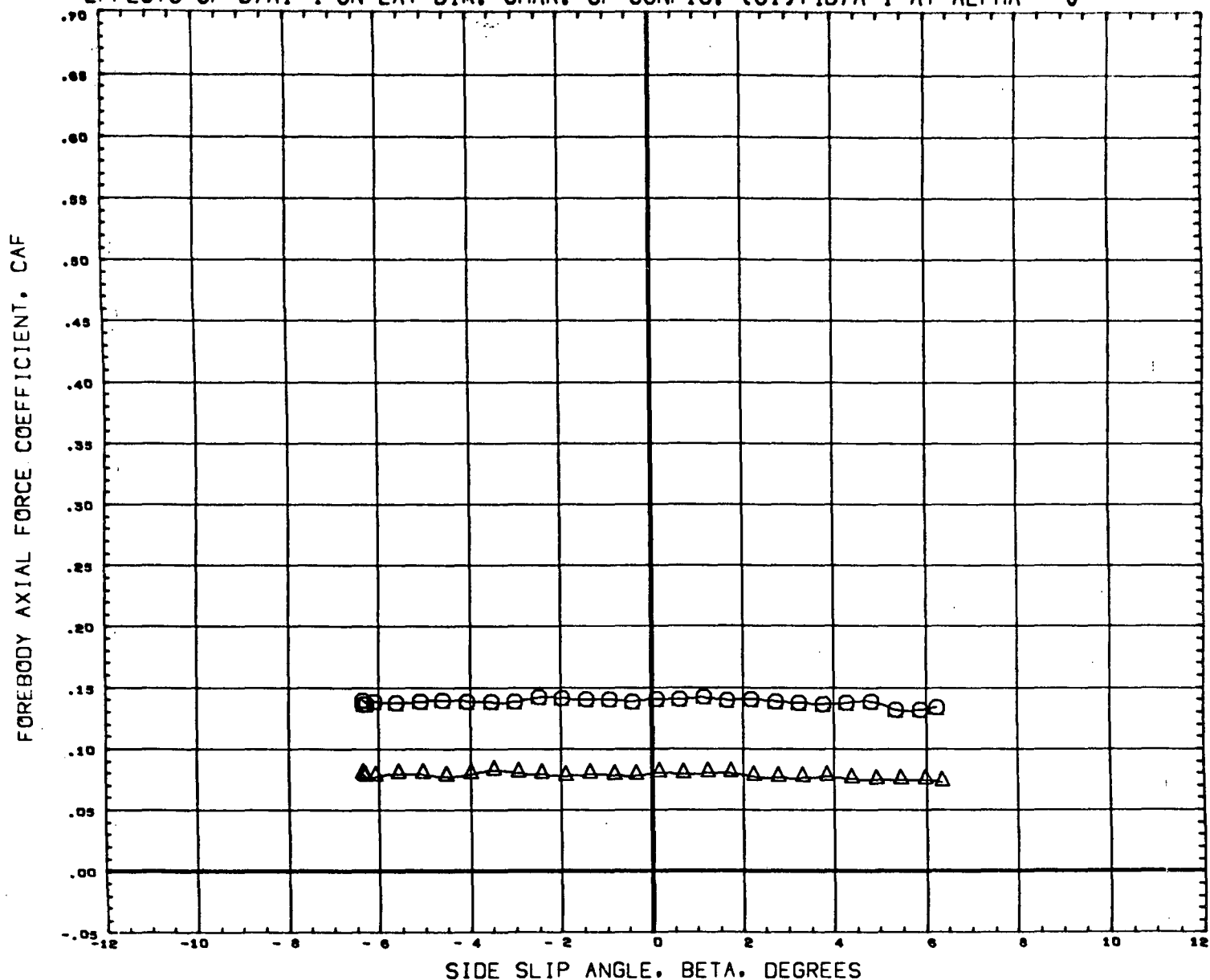
SIDE SLIP ANGLE, BETA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74E1) | MDAC S-222 COMPOSITE(T-CG) (O1)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

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EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (01)T4B7A-1 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (TD74C8) MDAC S-222 COMPOSITE (T-C6) (01)T4B7A1-4
 (RD74E1) MDAC S-222 COMPOSITE (T-C6) (01)T4

ALPHA 0.000 ELEVTR 0.000 AILRON 0.000 RUDDER 0.000
 0.000 0.000 0.000 0.000

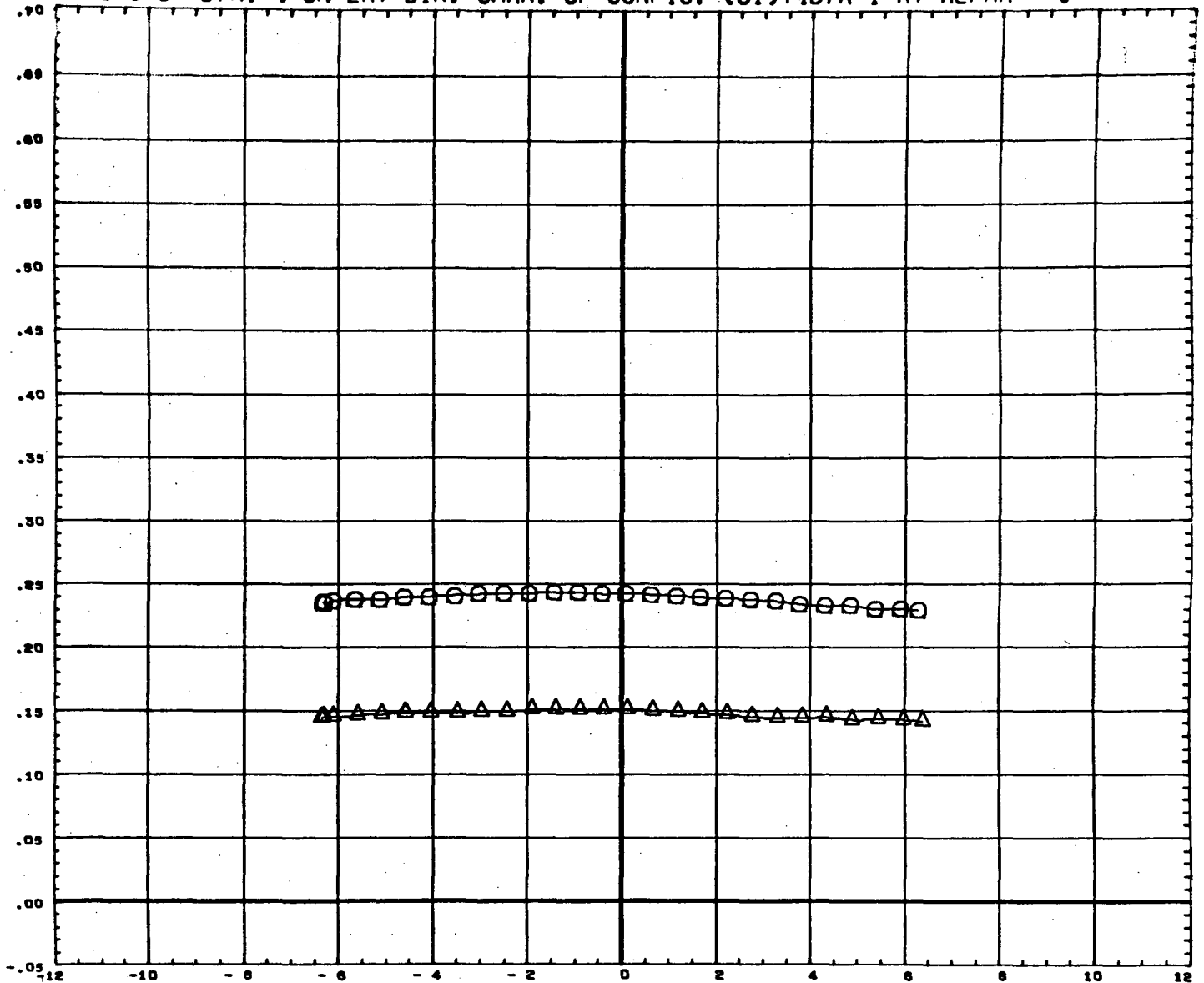
REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH .90

PAGE 506

EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (01)T4B7A-1 AT ALPHA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



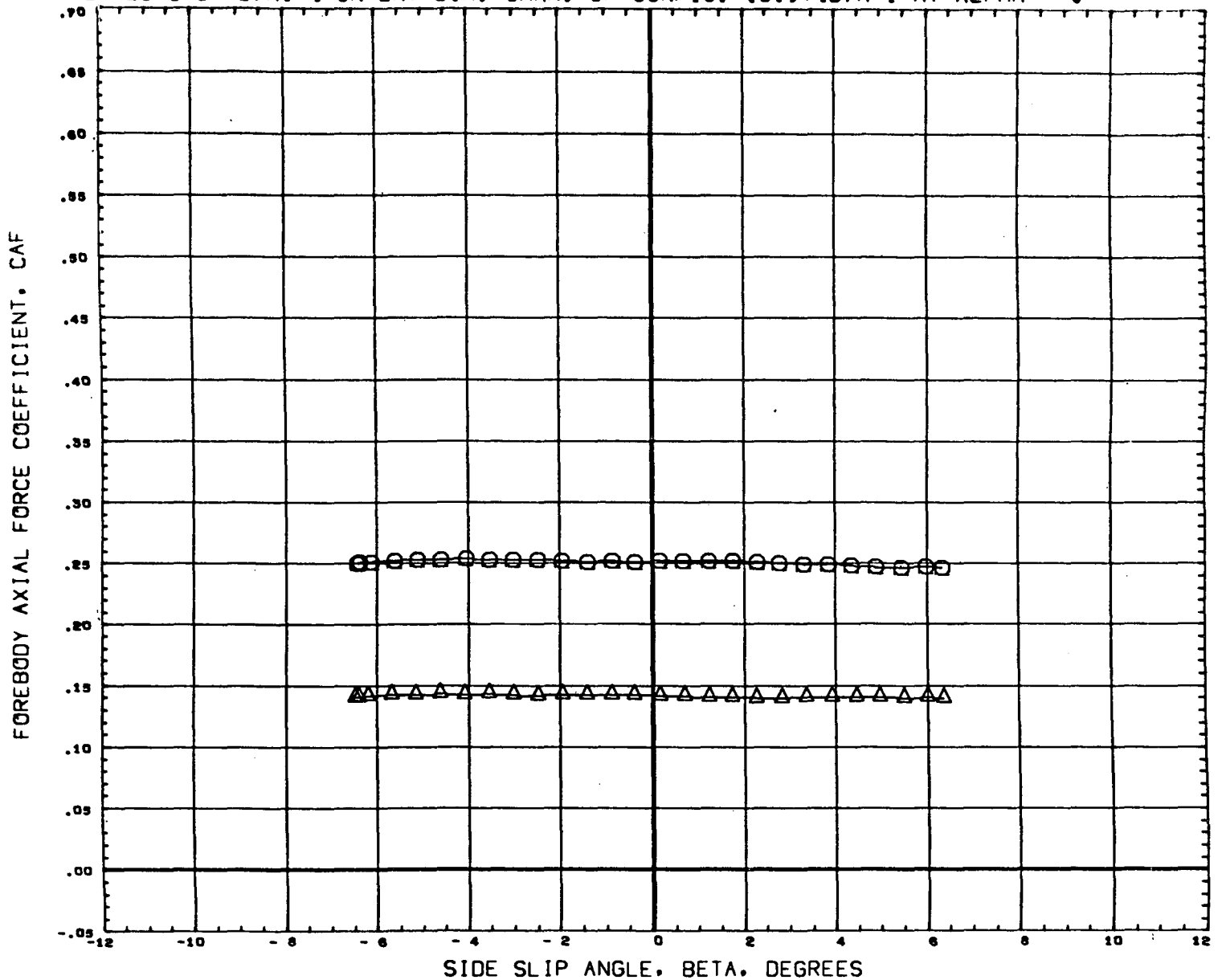
SIDE SLIP ANGLE, BETA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74E1) | MDAC S-222 COMPOSITE(T-CG) (01)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

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EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (01)T4B7A-1 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (TD74C8) (01)T4B7A1-4
 (RD74E1) (01)T4

ALPHA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 0.000

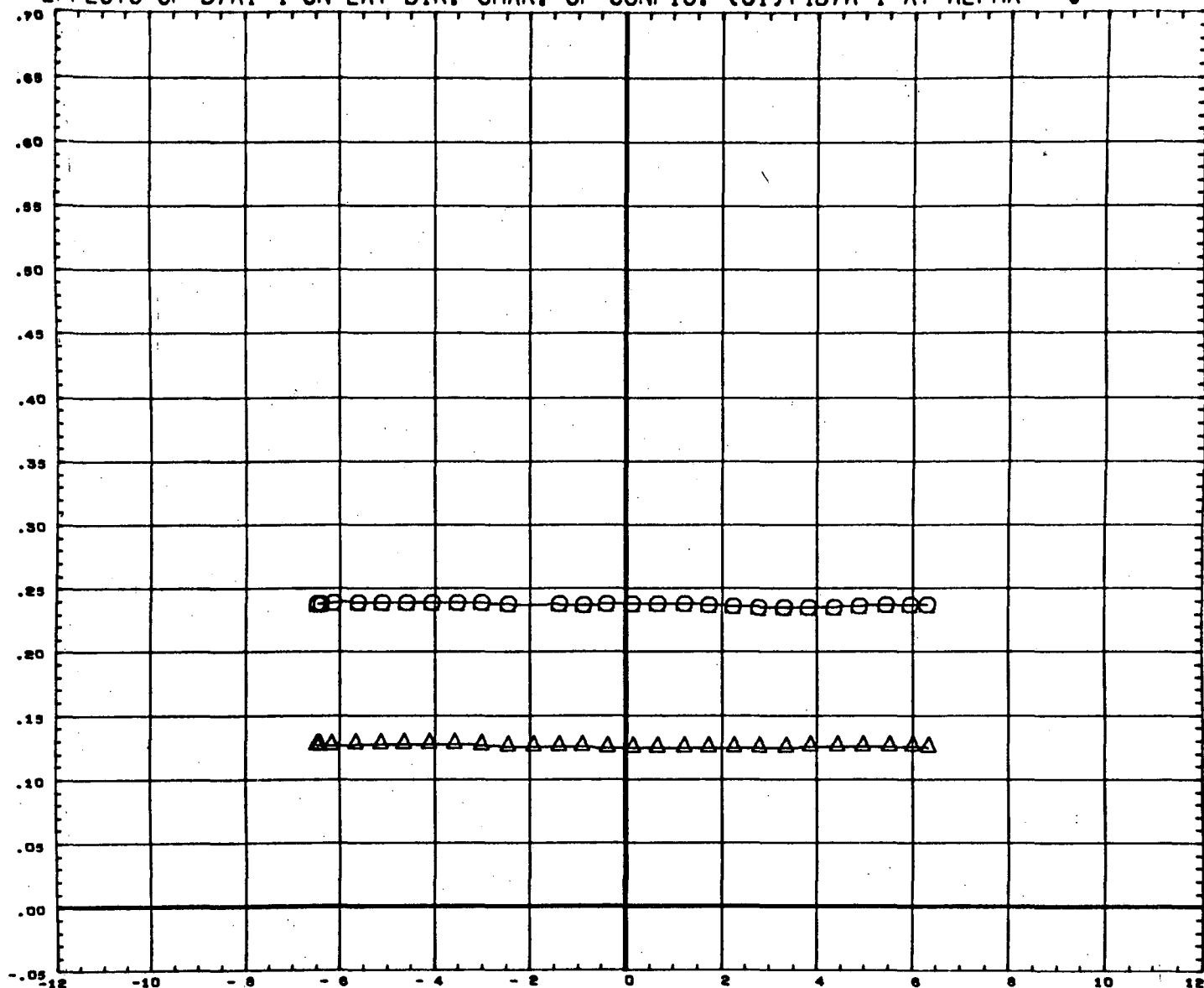
REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRF 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH 1.51

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EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (01)T4B7A-1 AT ALPHA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



SIDE SLIP ANGLE, BETA, DEGREES

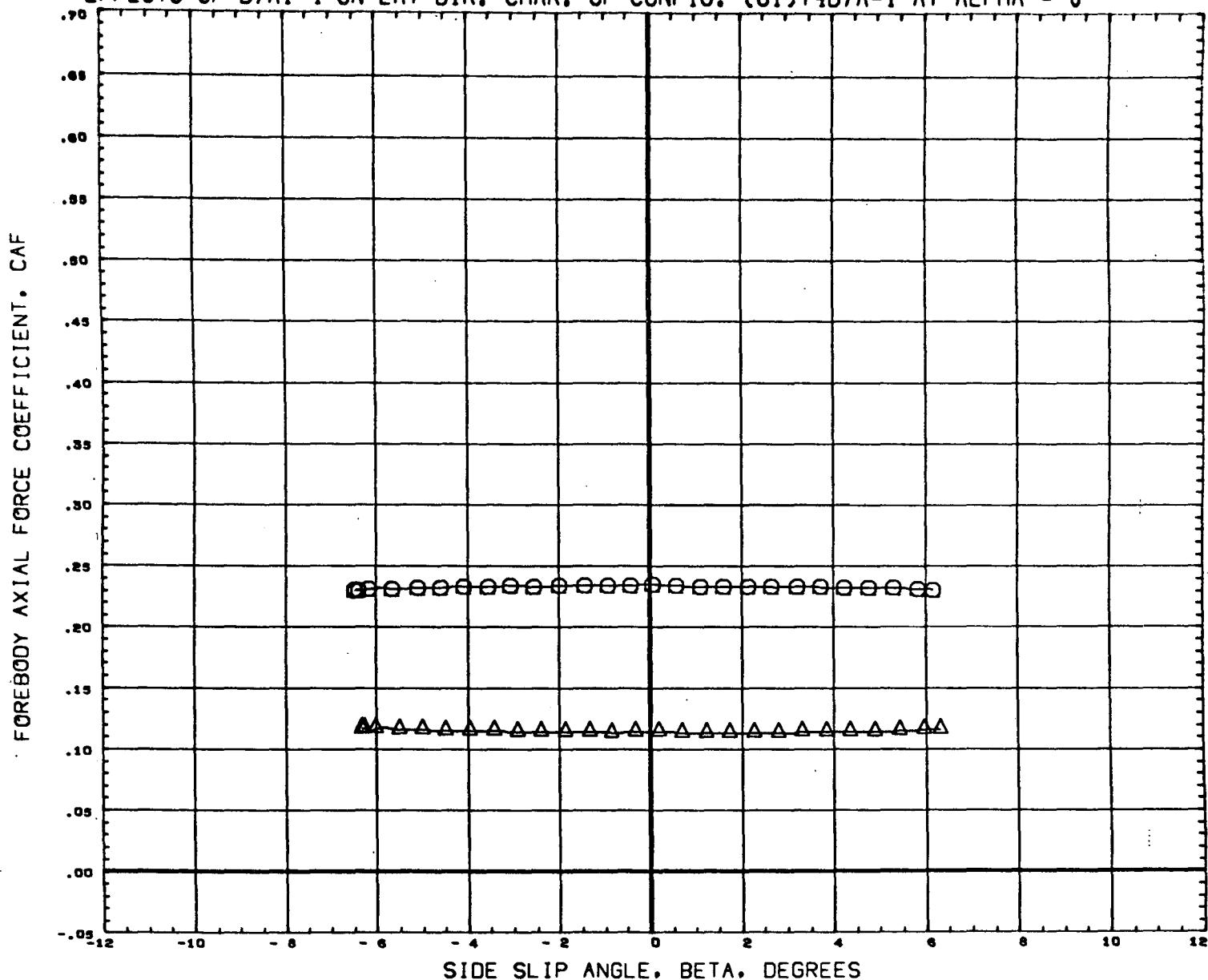
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (RD74E1) | MDAC S-222 COMPOSITE(T-CG) (01)T4 |

| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-------|--------|--------|--------|-----------------------|-----------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 809.5004 | IN. |
| | | | | BREF | 882.0004 | IN. |
| | | | | XMRP | 557.0004 | IN. |
| | | | | YMRP | 0.0000 | IN. |
| | | | | ZMRP | 200.0004 | IN. |
| | | | | SCALE | 0.0060 | SCALE |

MACH 2.20

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EFFECTS OF B7A1-4 ON LAT-DIR. CHAR. OF CONFIG. (01)T4B7A-1 AT ALPHA = 0

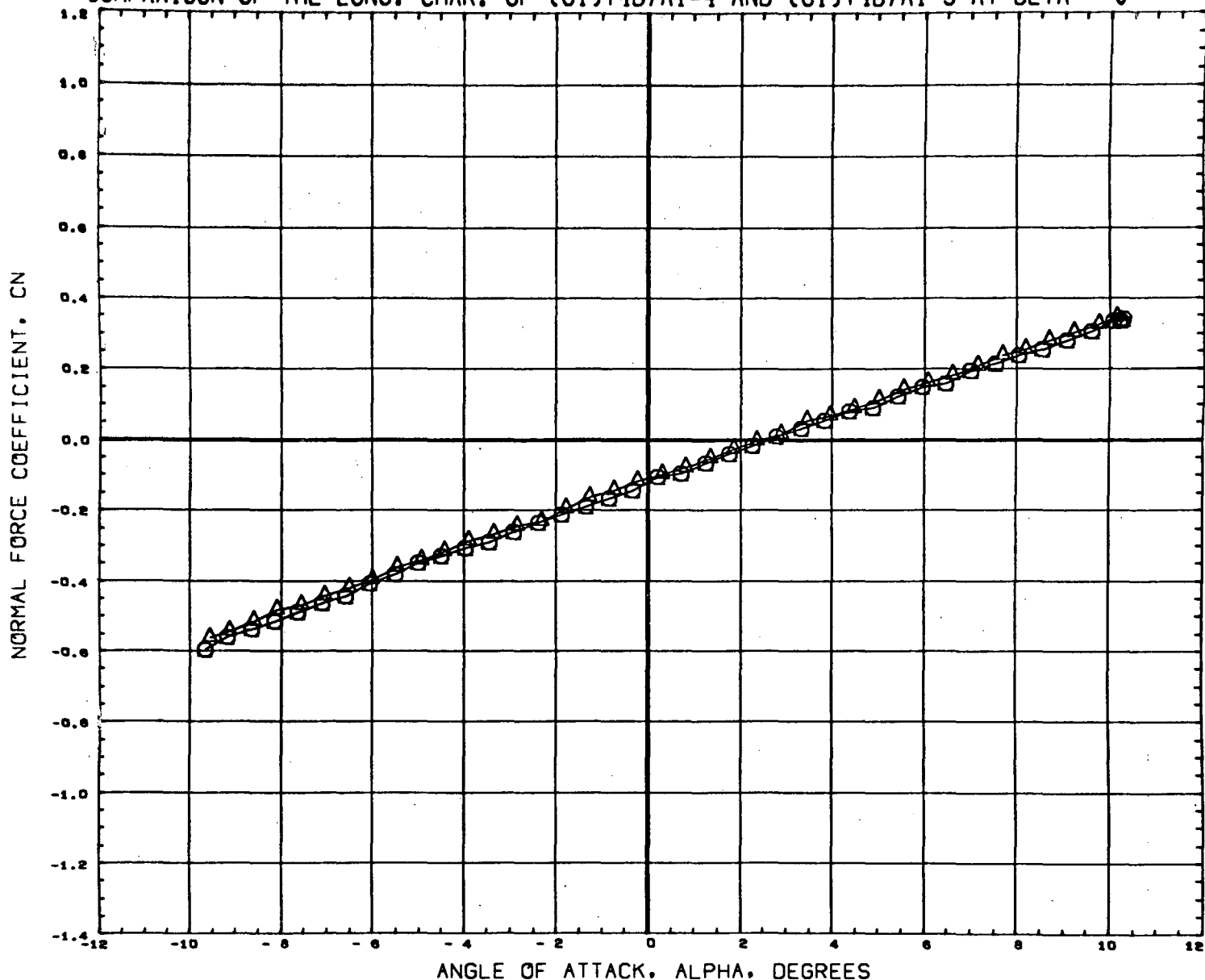


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74E1) | MDAC S-222 COMPOSITE(T-CG) (01)T4 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

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COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) (01)T4B7A1-4
(CD74E4) (01)T4B7A1-5

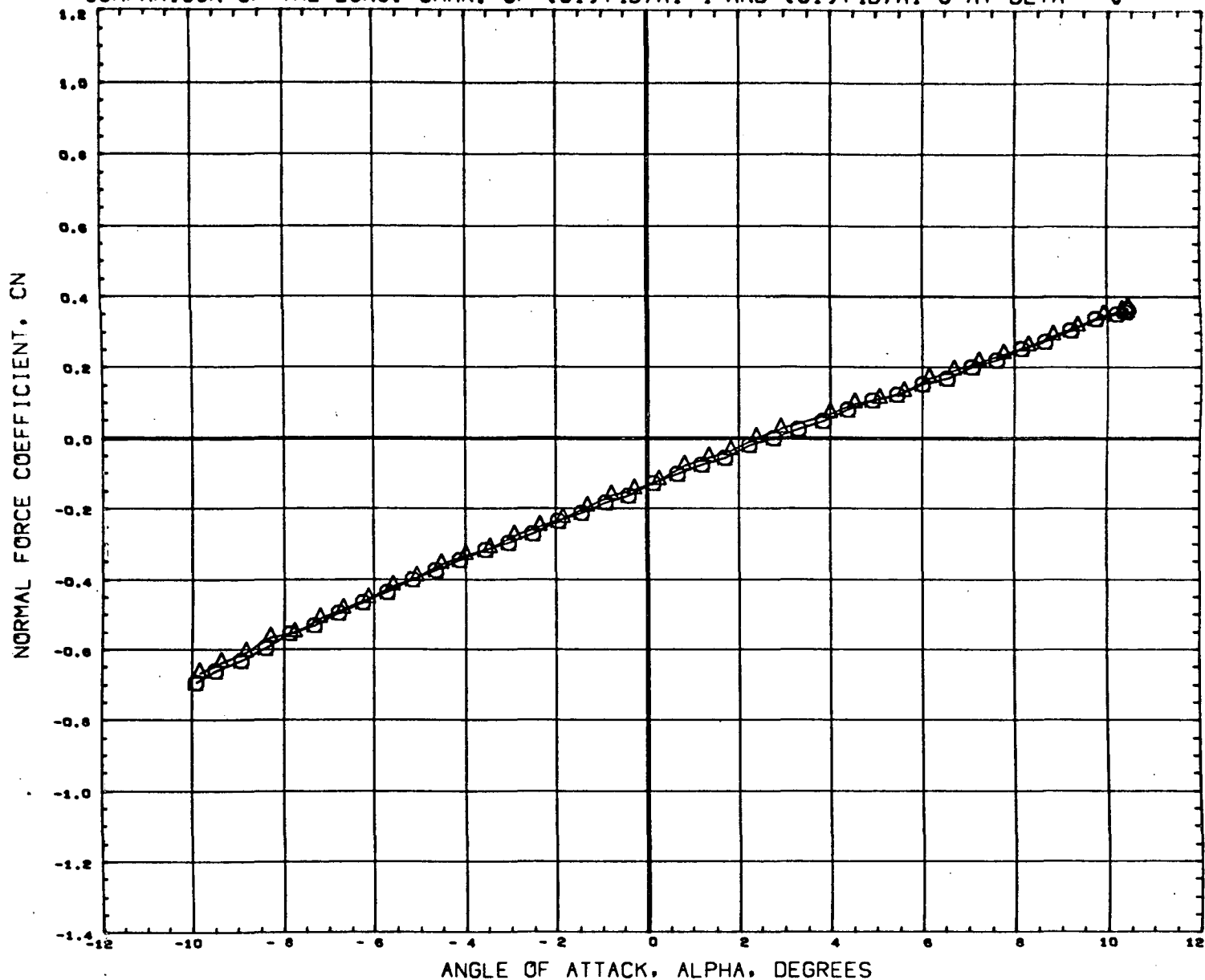
BETA ELEVTR AILRON RUDDER
0.000 0.000 0.000 0.000
0.000 0.000 0.000 0.000

REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060 SCALE

MACH .58

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COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

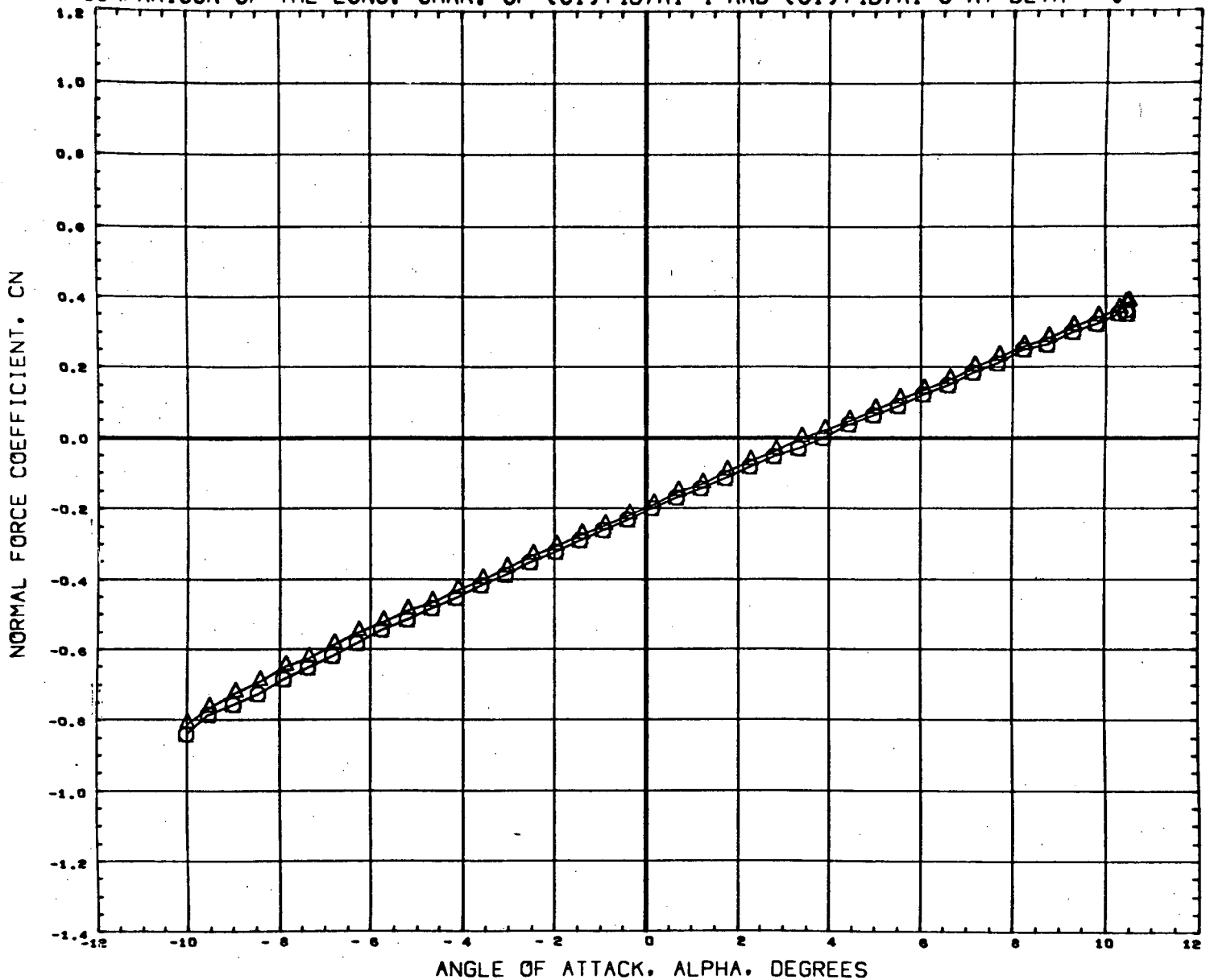


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

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COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



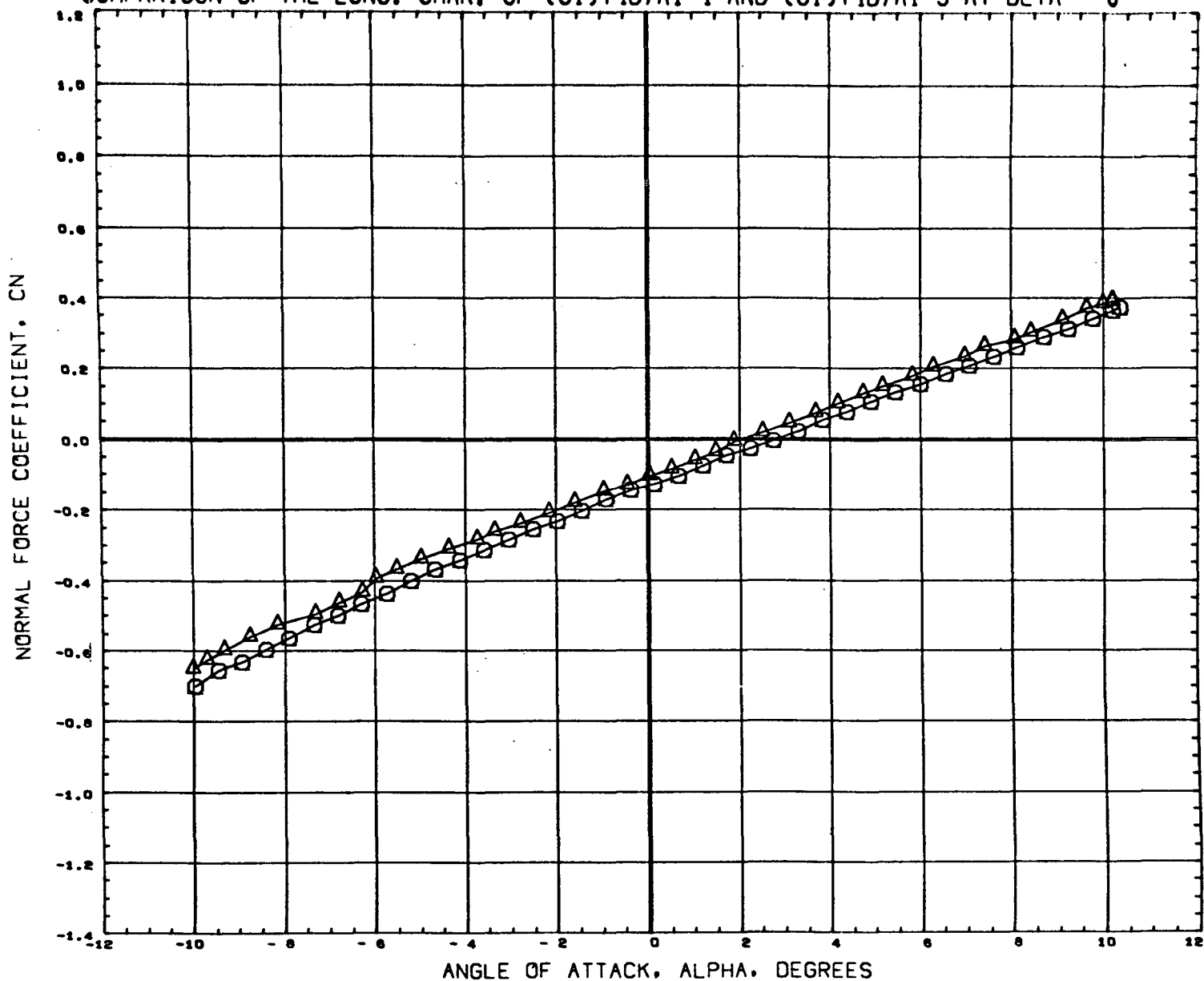
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (C074C7) | MDAC S-222 COMPOSITE (T-C6) (01)T4B7A1-4 |
| (C074E4) | MDAC S-222 COMPOSITE (T-C6) (01)T4B7A1-5 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 537.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |


MACH 1.08


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COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4

(CD74E4)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5

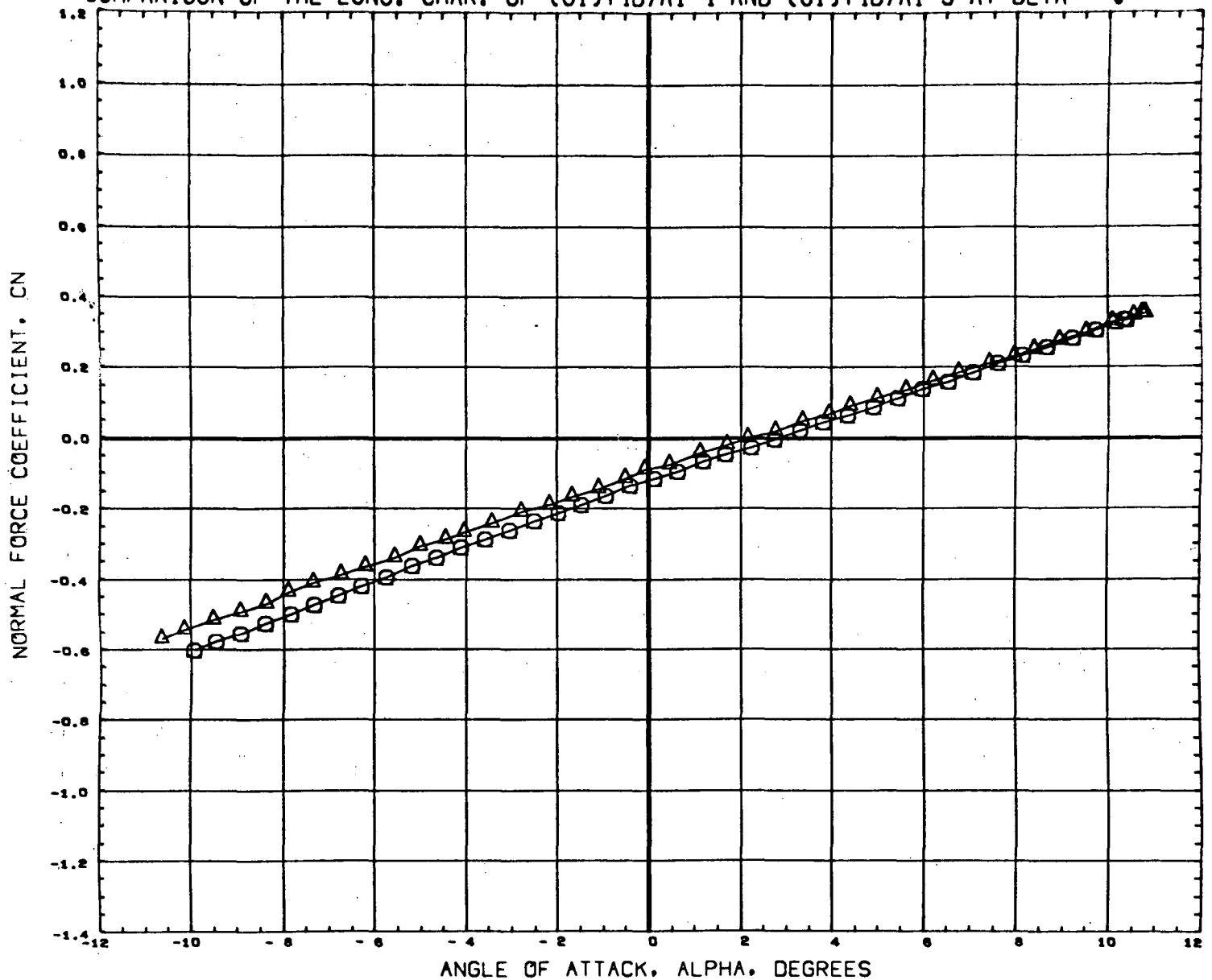
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | |
|-----------------------|------------------|
| SREF | 3155.3040 SQ.FT. |
| LREF | 609.5004 IN. |
| BREF | 882.0004 IN. |
| XMRP | 557.0004 IN. |
| YMRP | 0.0000 IN. |
| ZMRP | 200.0004 IN. |
| SCALE | 0.0060 SCALE |

MACH 1.51

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COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

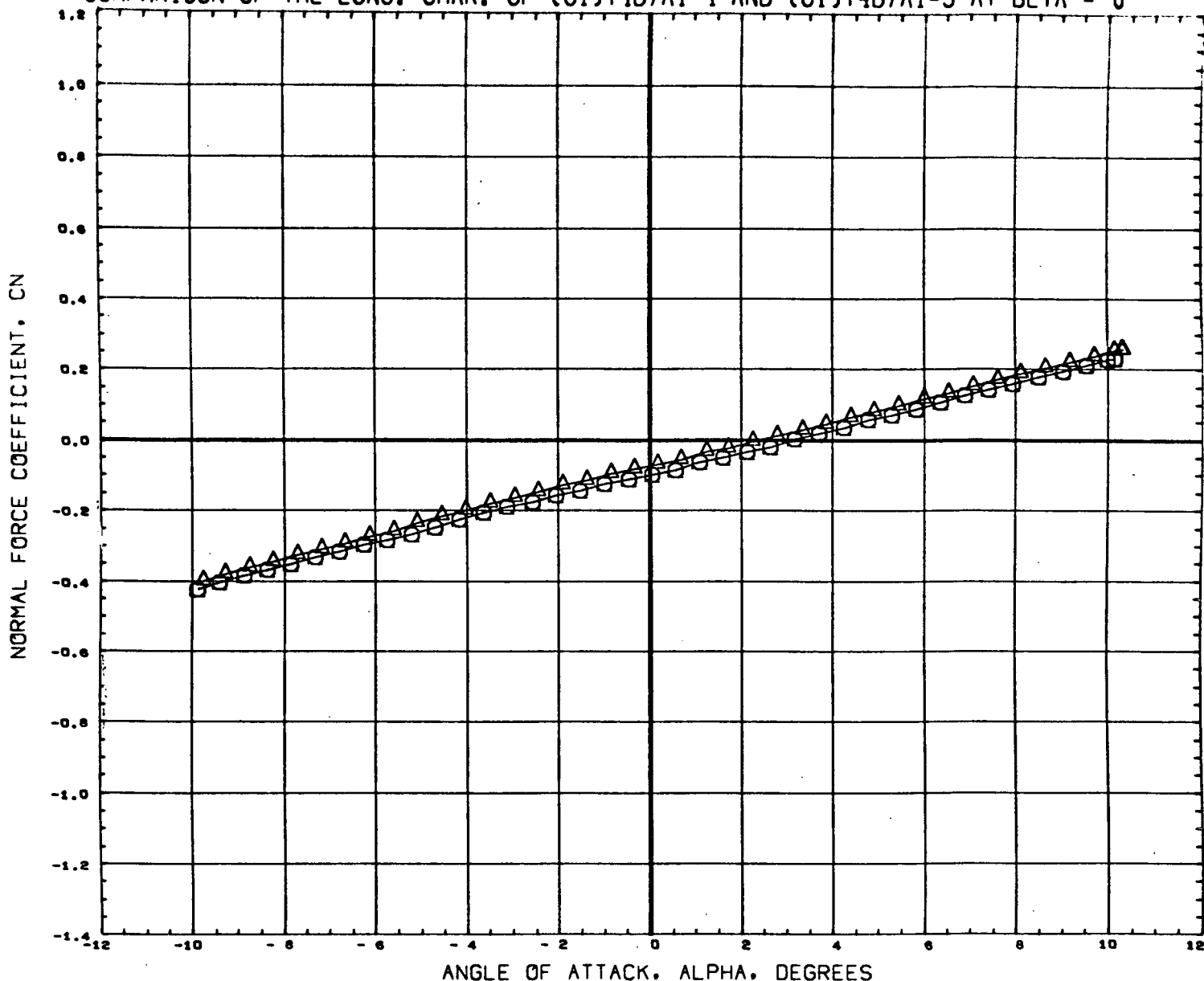


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

PAGE 515

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
 (CD74E4) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

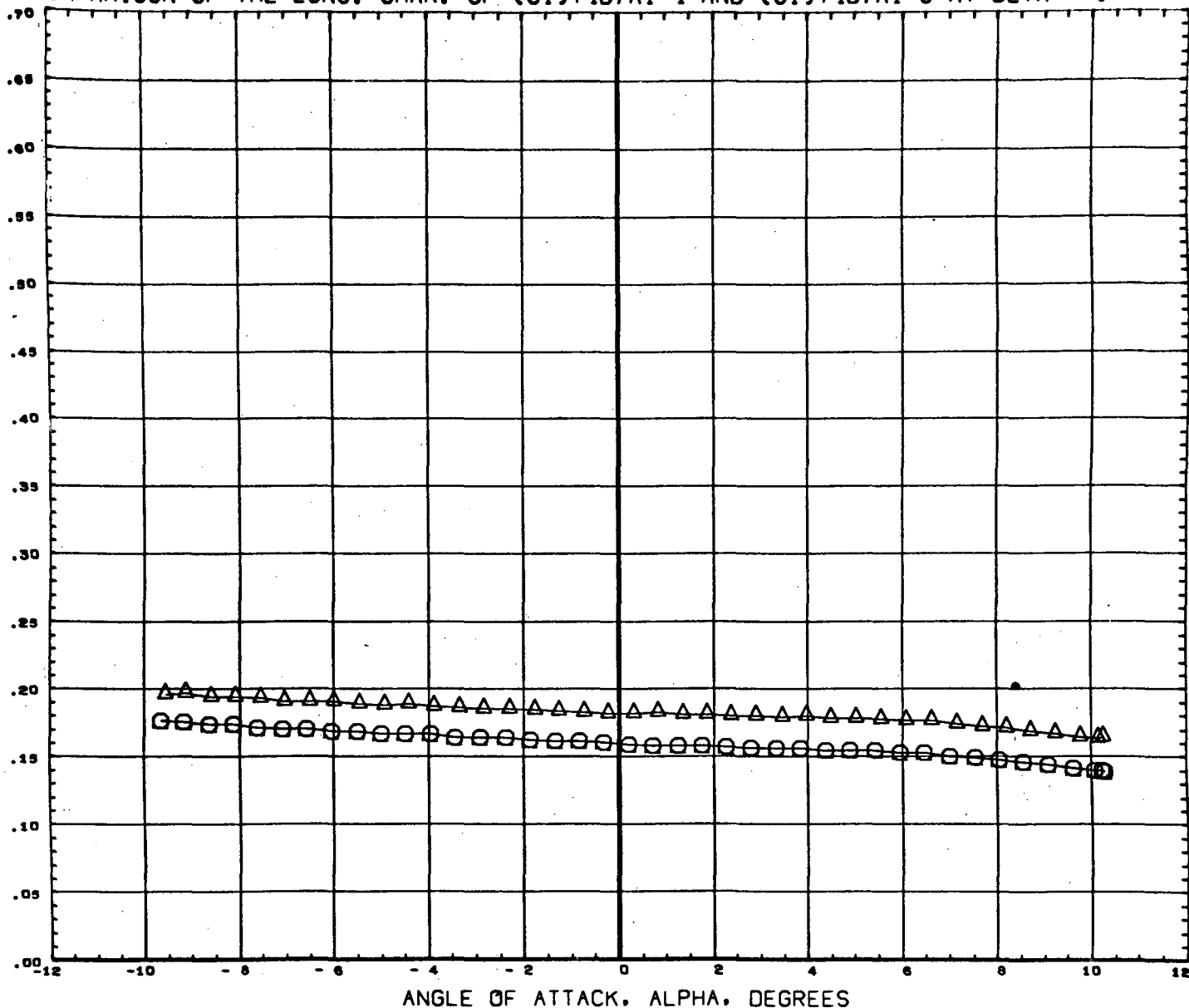
| REFERENCE INFORMATION | |
|-----------------------|------------------|
| SREF | 3155.3040 SQ.FT. |
| LREF | 609.5004 IN. |
| BREF | 892.0004 IN. |
| XMRP | 557.0004 IN. |
| YMRP | 0.0000 IN. |
| ZMRP | 200.0004 IN. |
| SCALE | 0.0060 SCALE |

MACH 4.47

PAGE 516

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

AXIAL FORCE COEFFICIENT, CA



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74E4) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

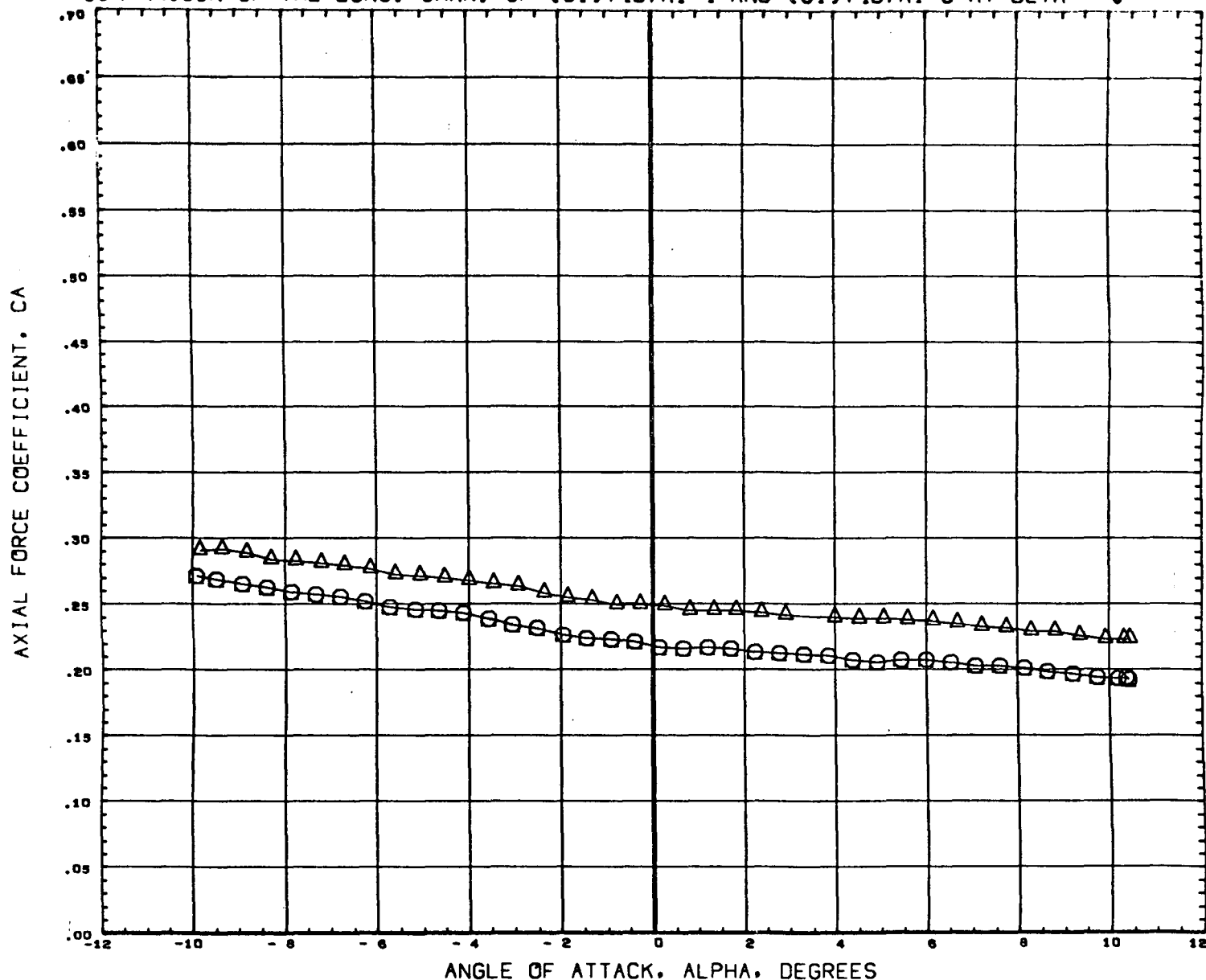
| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 662.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH

.58

PAGE 517

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (CD74E4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 |

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

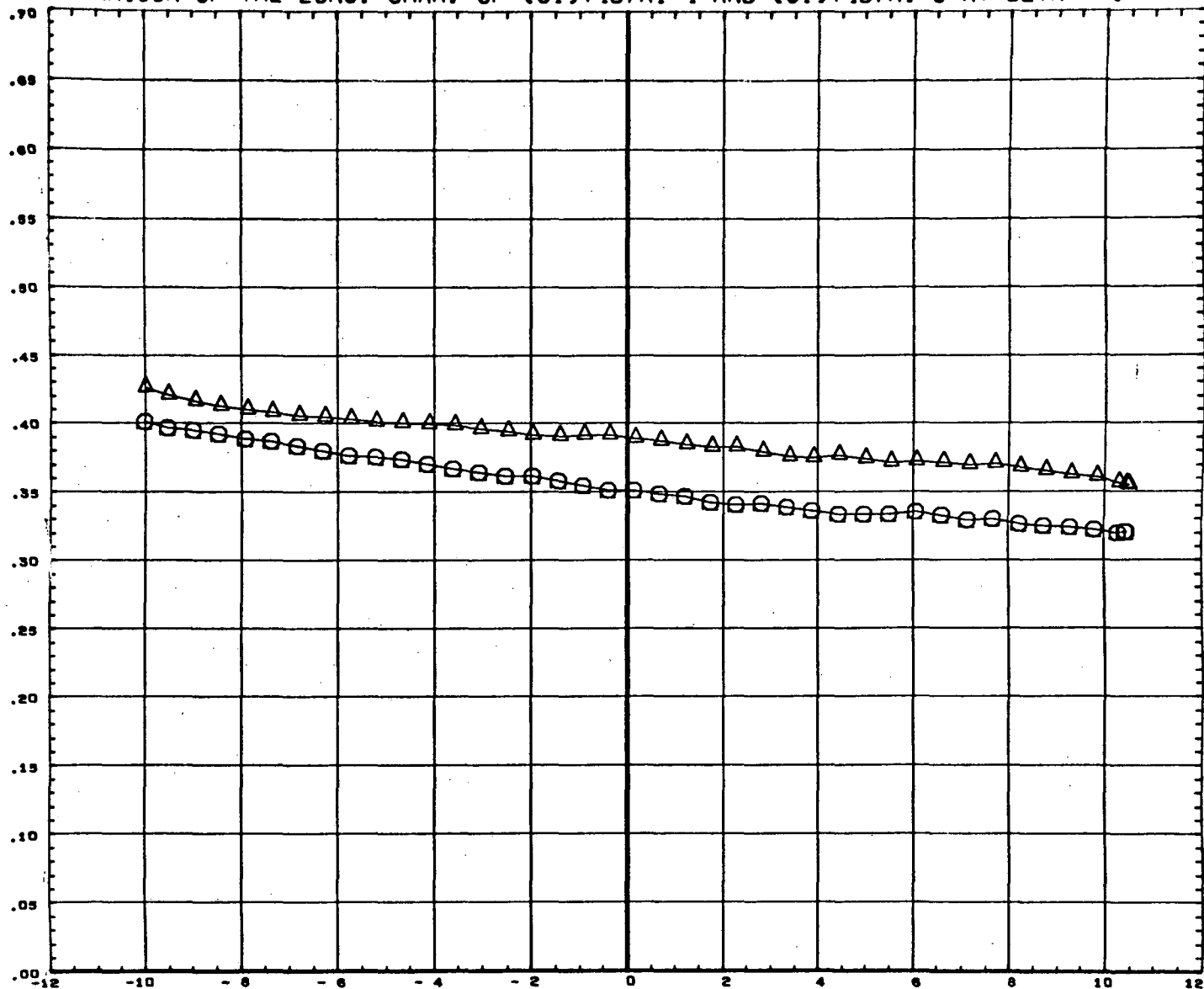
| REFERENCE INFORMATION | |
|-----------------------|------------------|
| SREF | 3155.3040 SQ.FT. |
| LREF | 609.5004 IN. |
| BREF | 882.0004 IN. |
| XMRP | 557.0004 IN. |
| YMRP | 0.0000 IN. |
| ZMRP | 200.0004 IN. |
| SCALE | 0.0060 SCALE |

MACH .90

PAGE 518

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

AXIAL FORCE COEFFICIENT, CA



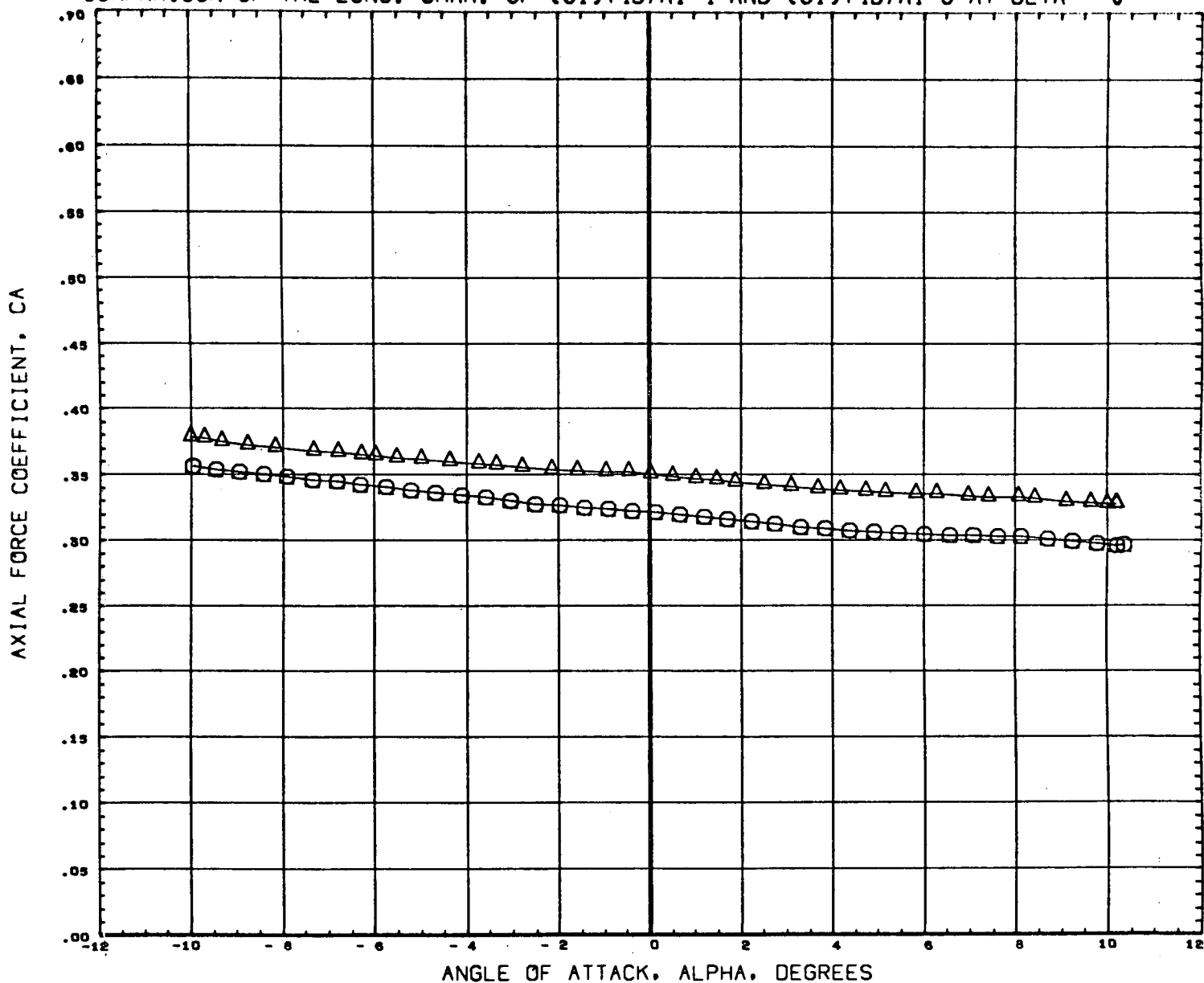
ANGLE OF ATTACK, ALPHA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

PAGE 519

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



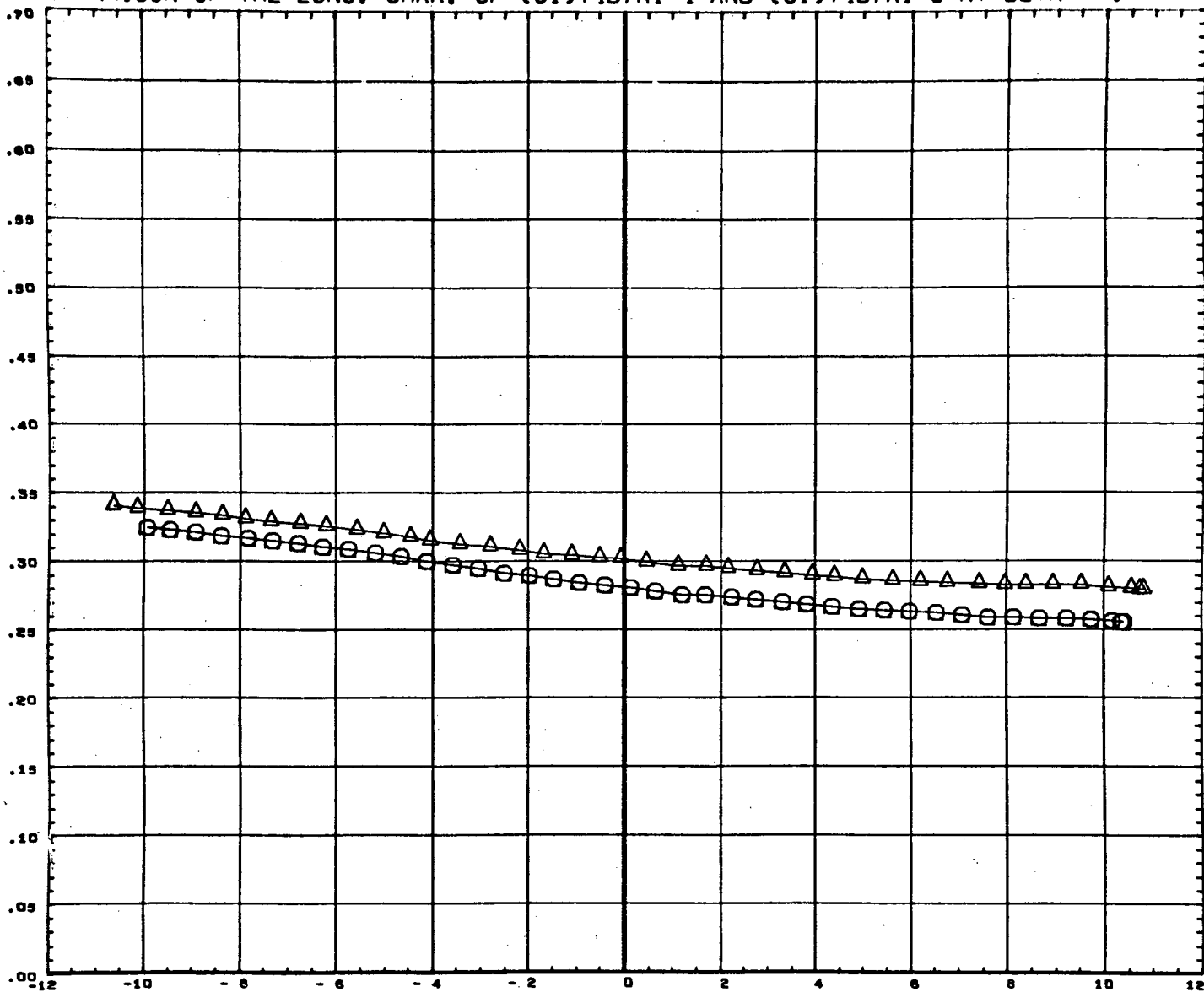
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.51

PAGE 520

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

AXIAL FORCE COEFFICIENT, CA



ANGLE OF ATTACK, ALPHA, DEGREES

DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
(CD74E4) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

BETA ELEVTR AILRON RUDDER

0.000 0.000 0.000 0.000
0.000 0.000 0.000 0.000

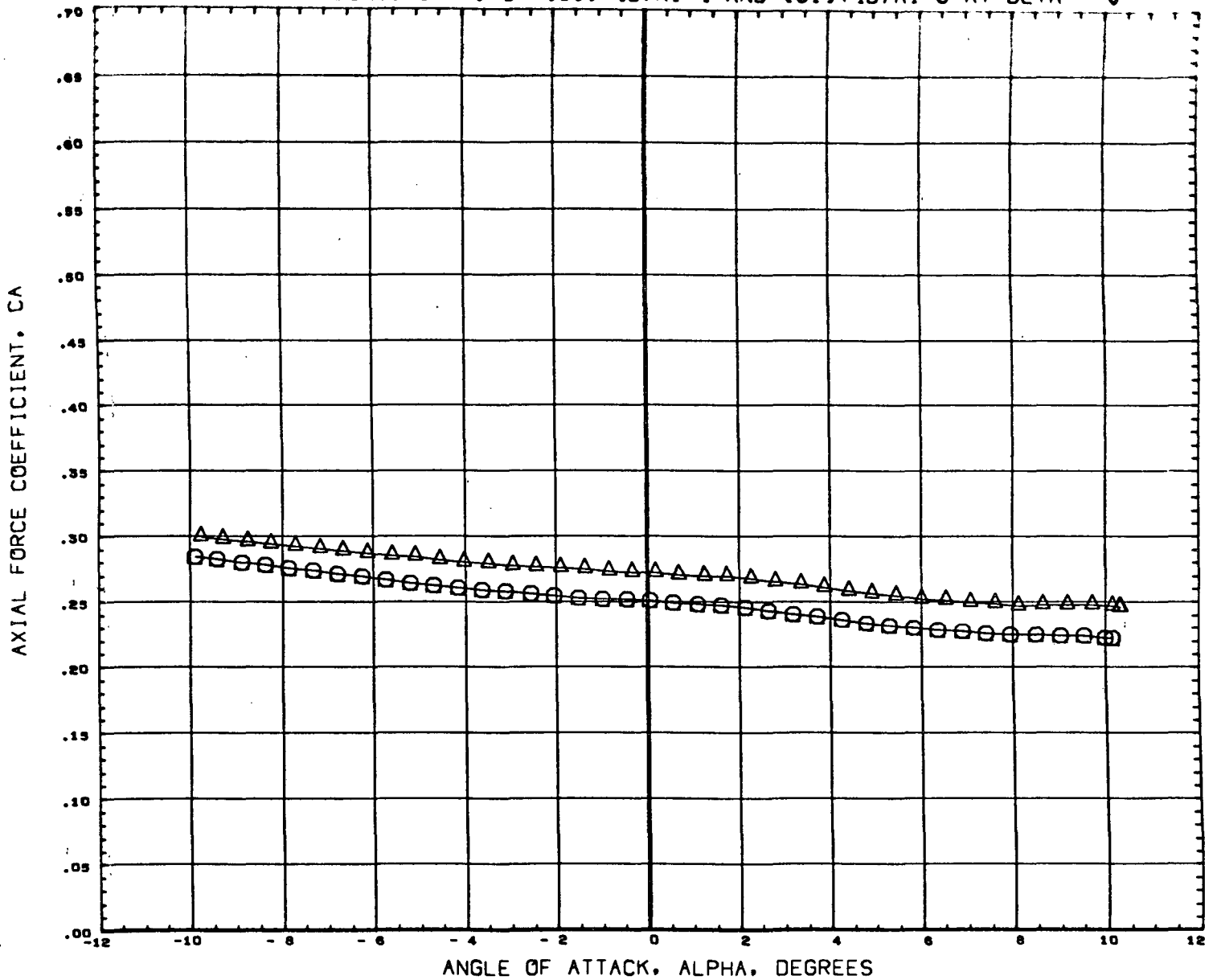
REFERENCE INFORMATION

SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 662.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060 SCALE

MACH 2.20

PAGE 521

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



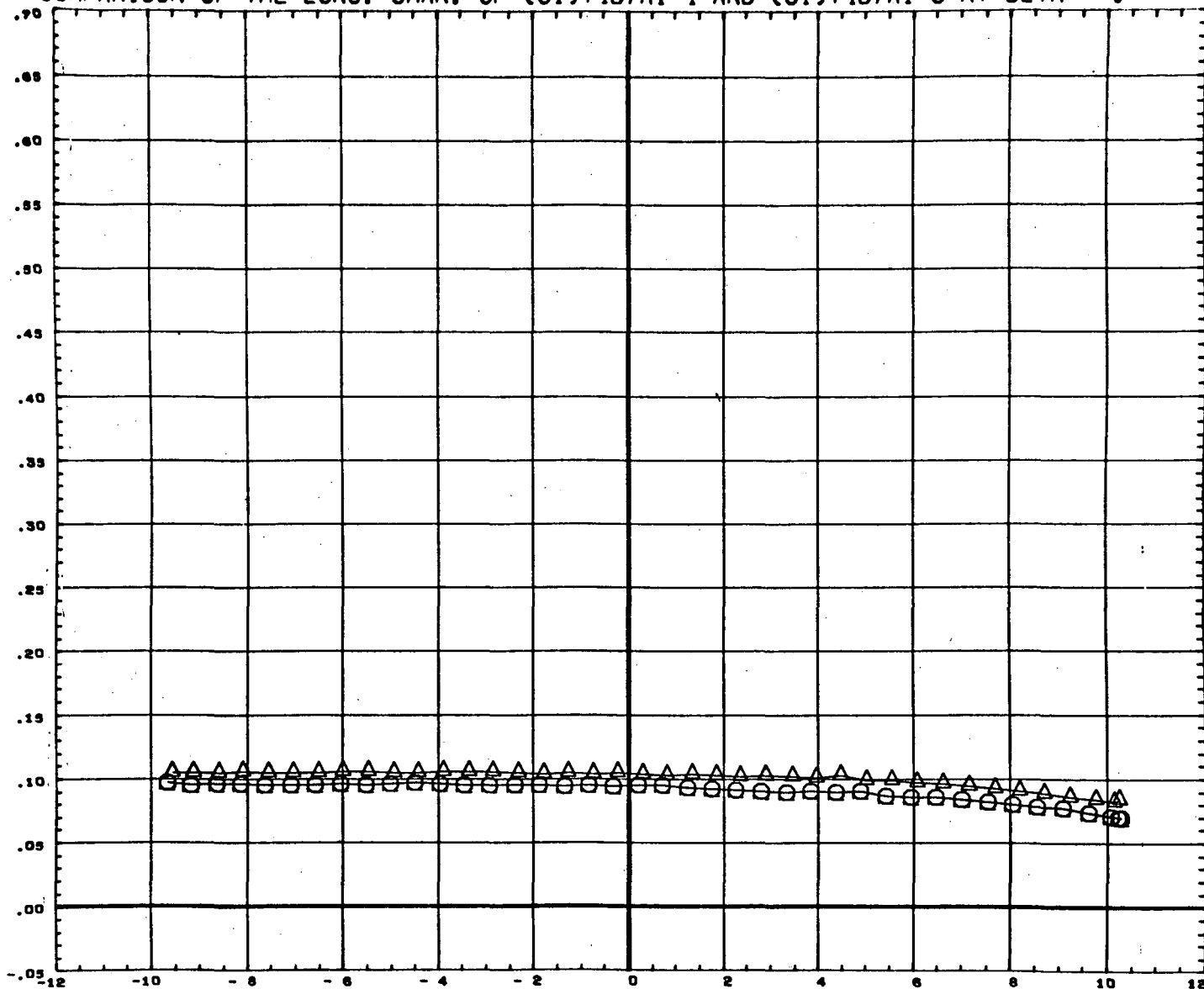
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 862.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0080 SCALE |

MACH 4.47

PAGE 522

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



ANGLE OF ATTACK, ALPHA, DEGREES

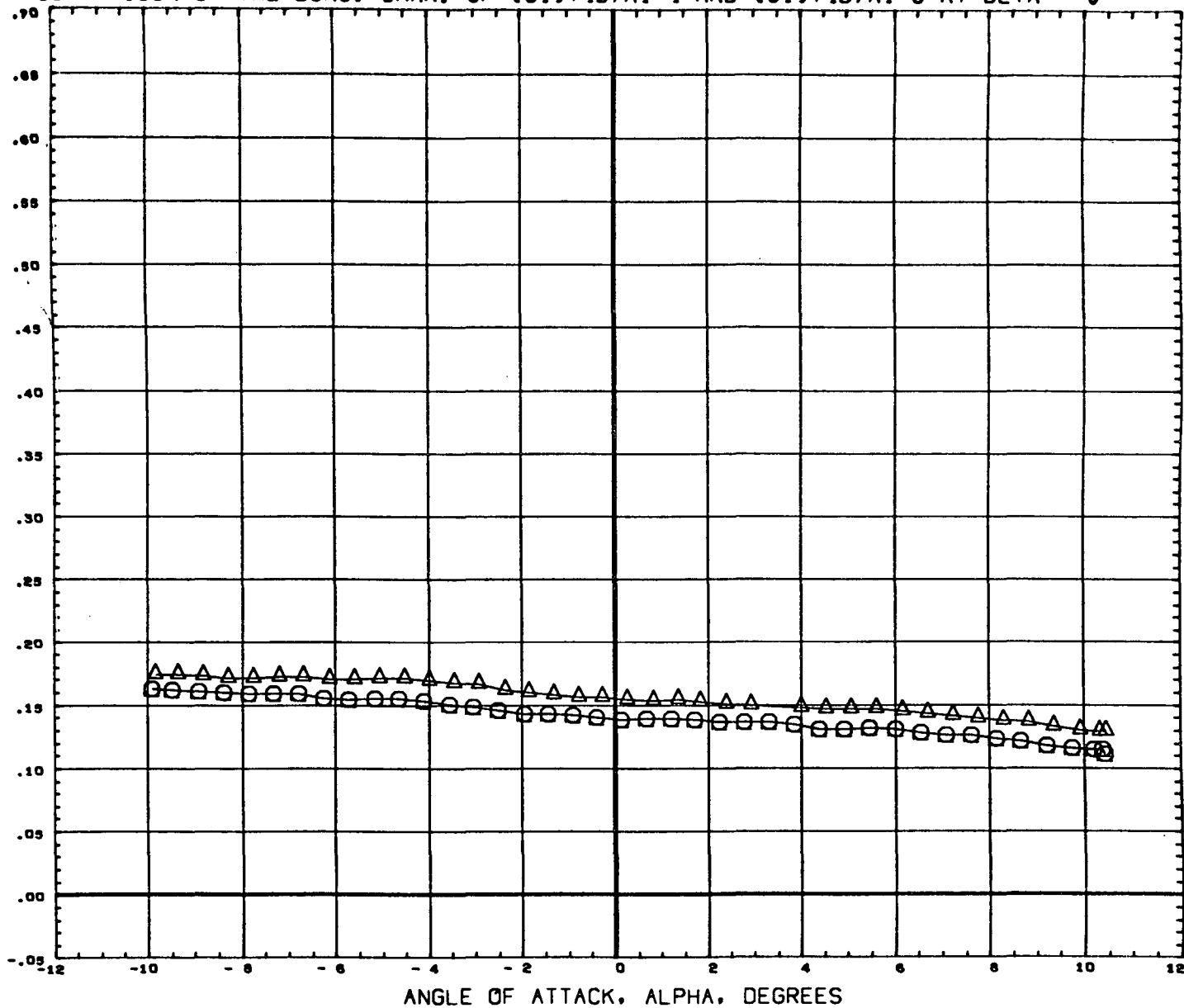
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

PAGE 523

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

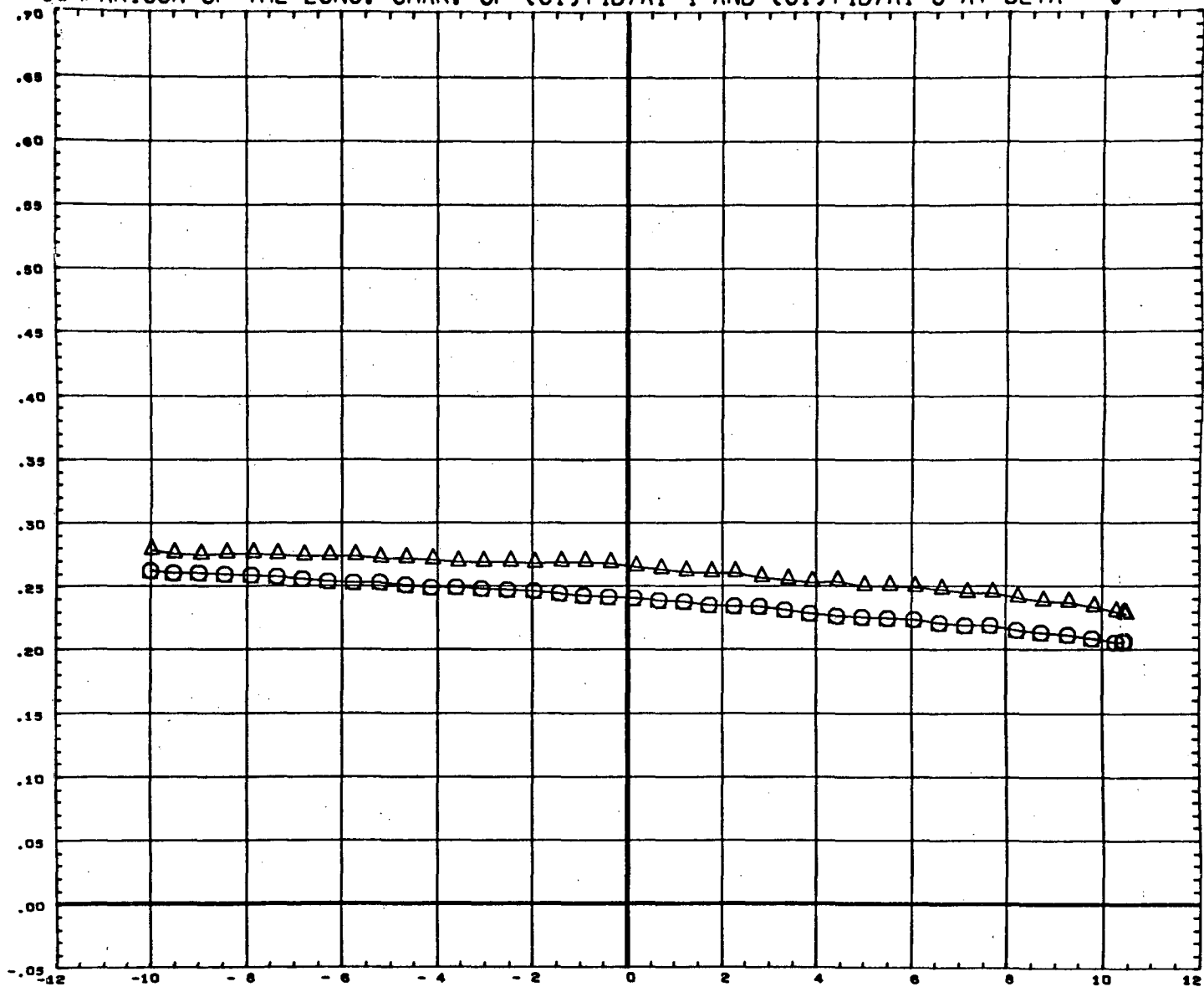
MACH

.90

PAGE 524

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF

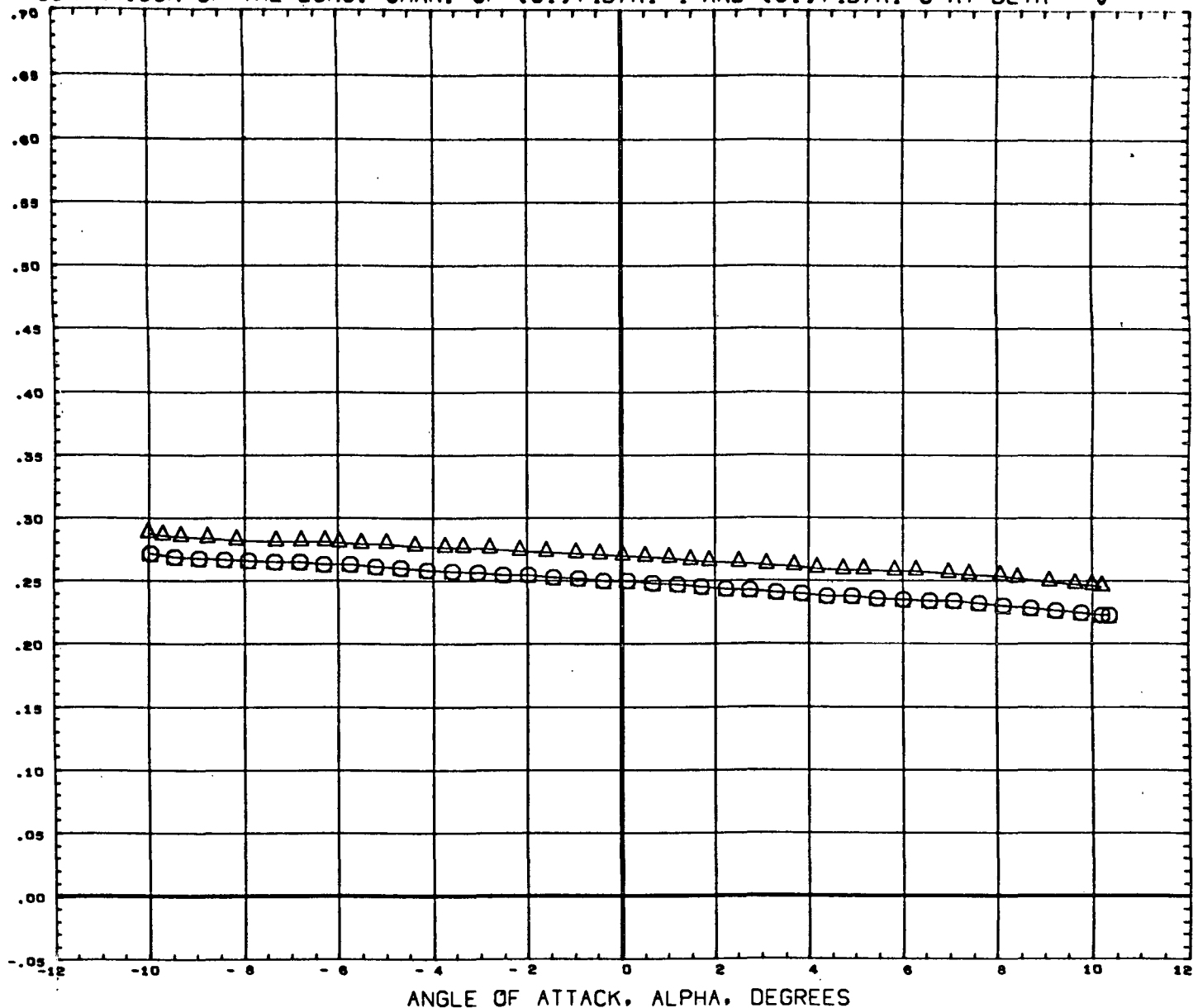


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 537.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

PAGE 525

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

| | | |
|----------|---|--|
| (CD74C7) | ⊙ | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (CD74E4) | △ | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 |

BETA ELEVTR AILRON RUDDER

| | | | |
|-------|-------|-------|-------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

REFERENCE INFORMATION

| | | |
|-------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

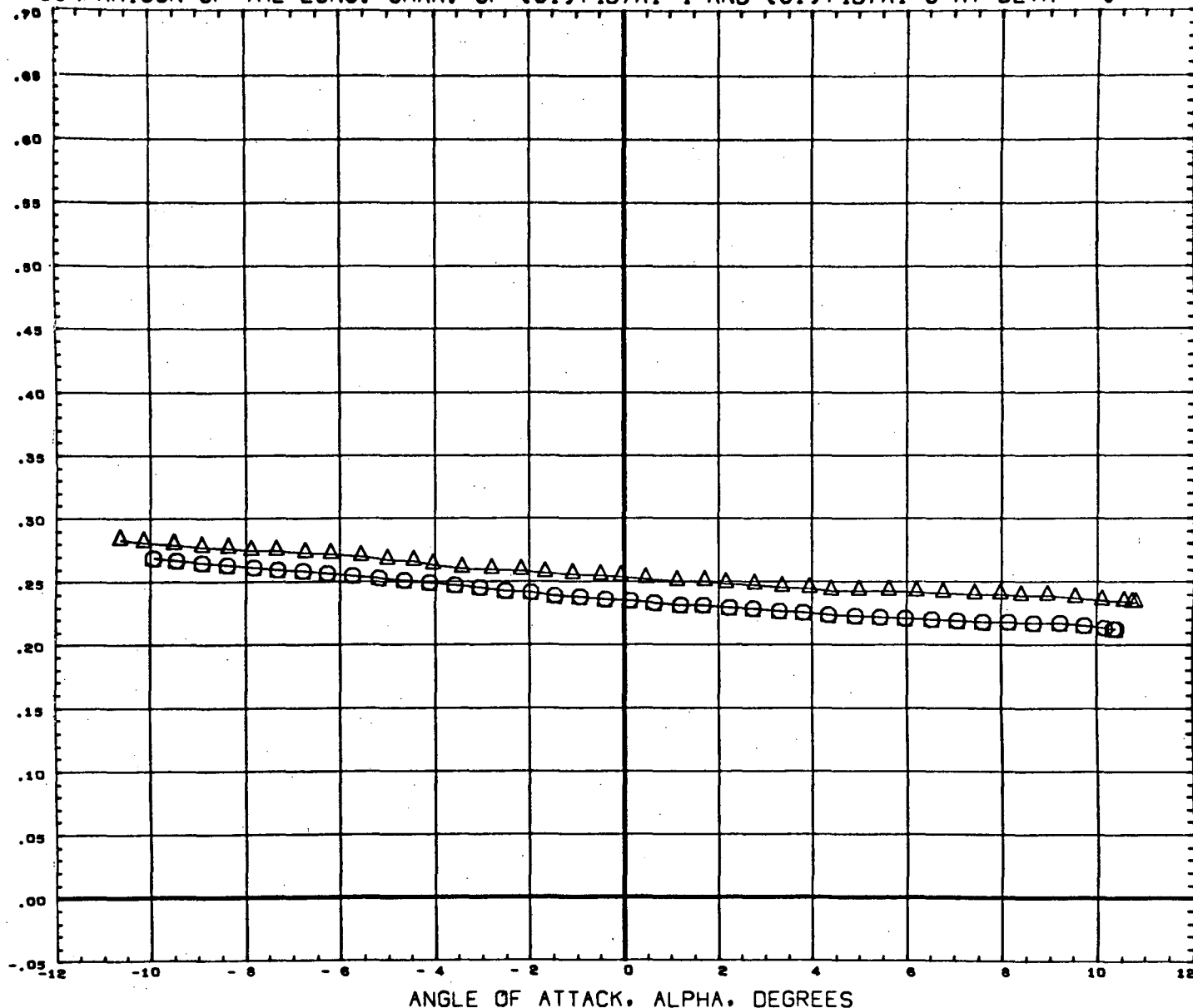
MACH

1.51

PAGE 526

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



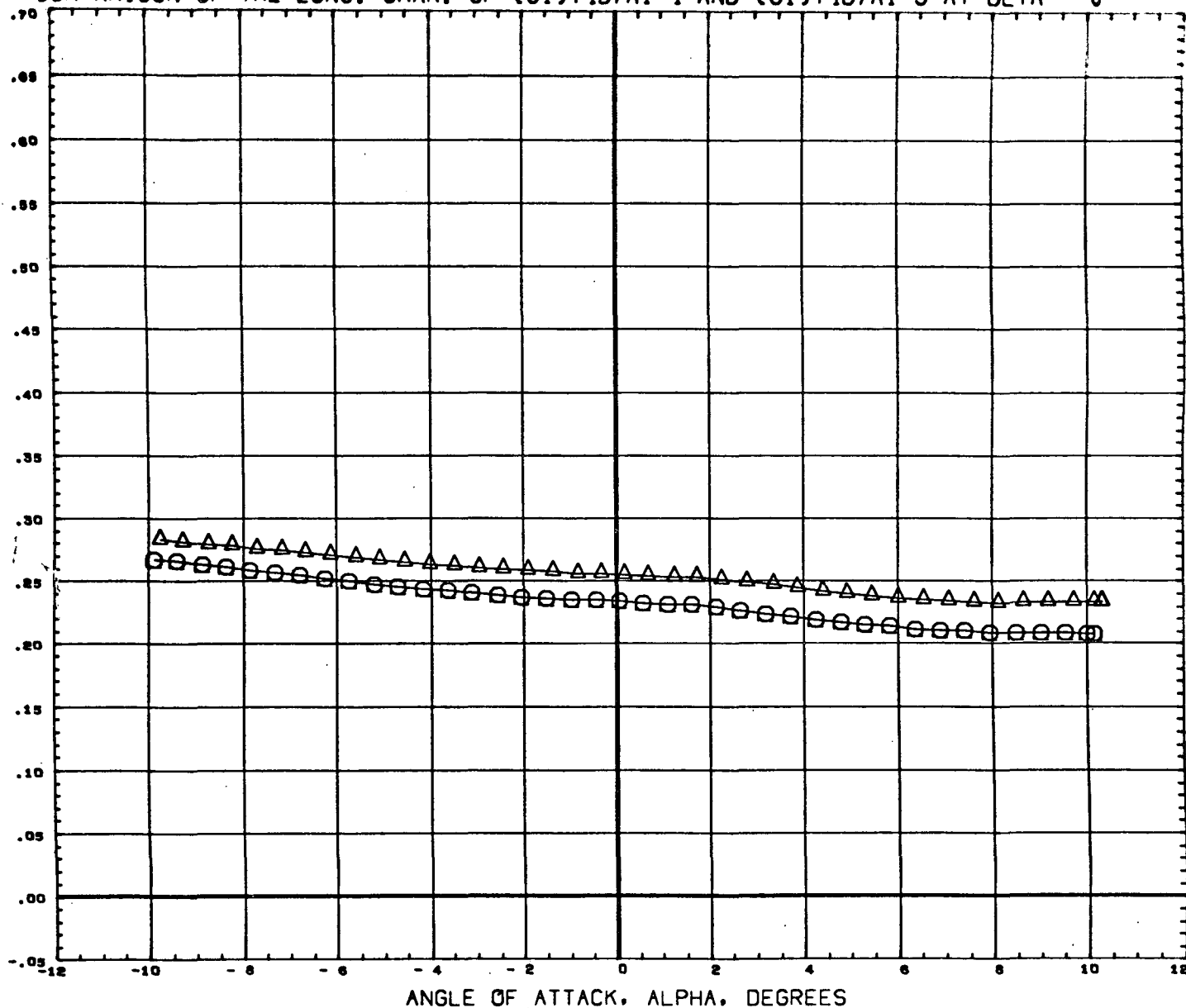
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 997.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

PAGE 527

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



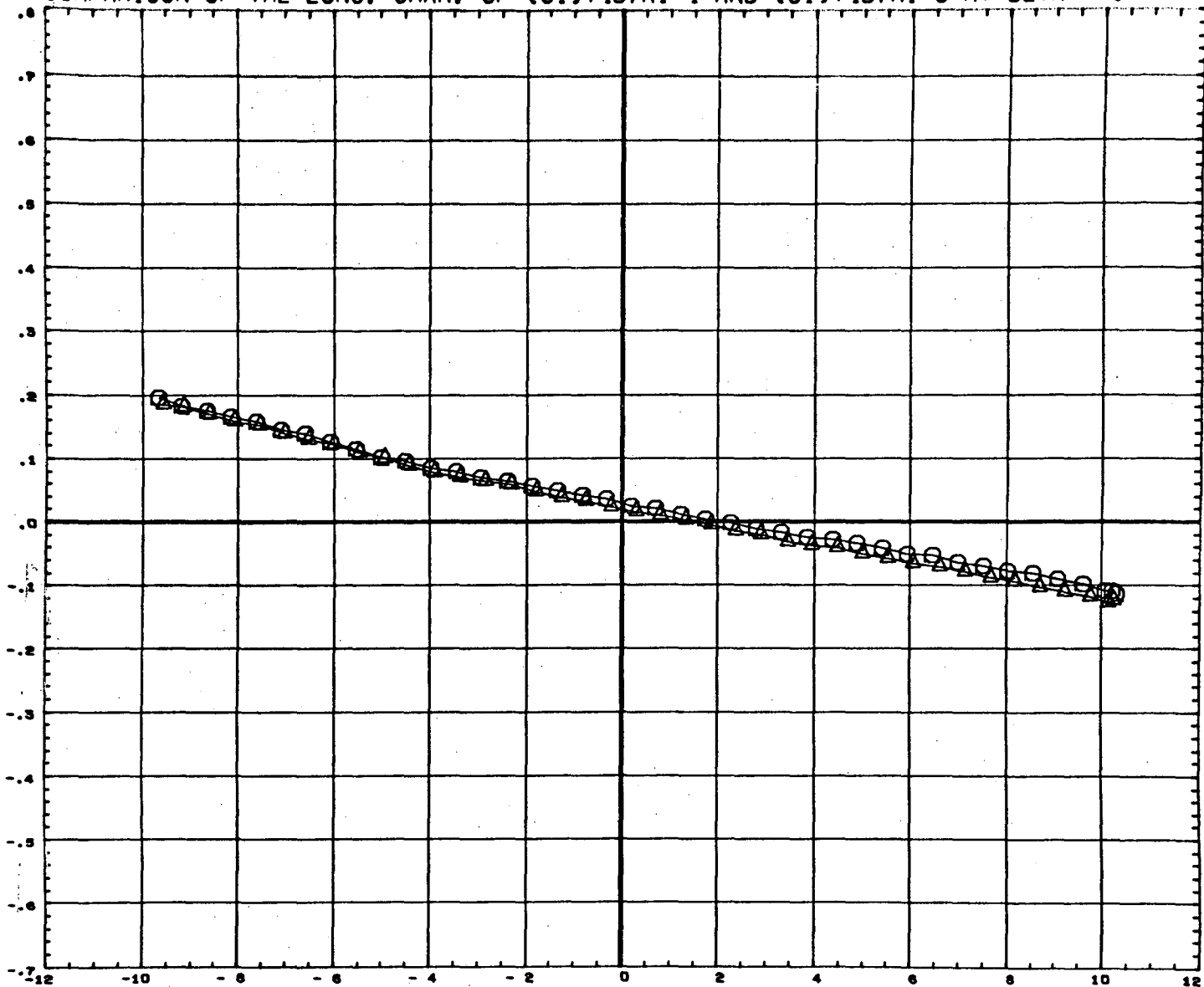
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

PAGE 528

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

PITCHING MOMENT COEFFICIENT, CLM



ANGLE OF ATTACK, ALPHA, DEGREES

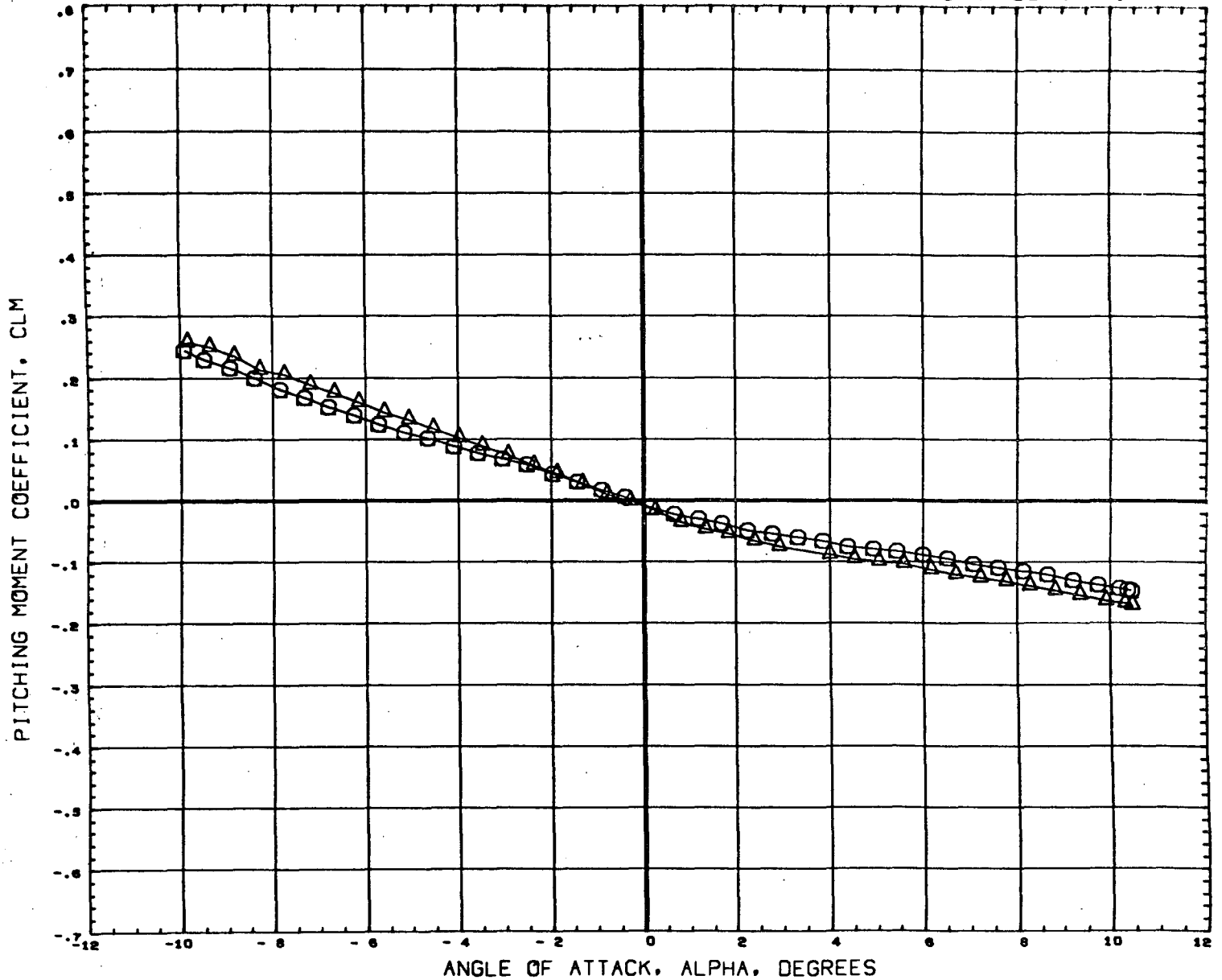
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 537.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH

.58

PAGE 529

COMPARISON OF THE LONG. CHAR. OF (O1)T4B7A1-4 AND (O1)T4B7A1-5 AT BETA = 0



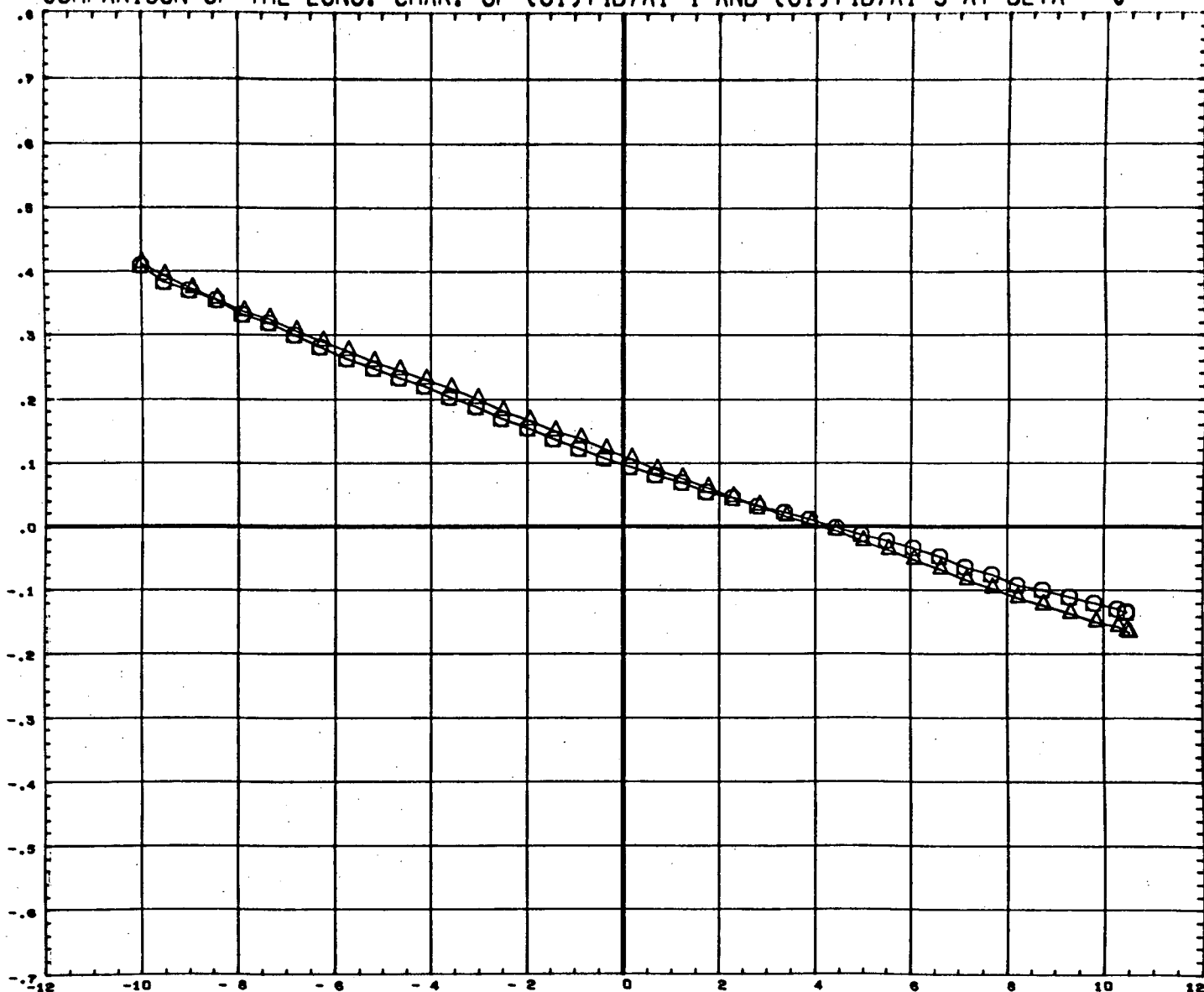
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

PAGE 530

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

PITCHING MOMENT COEFFICIENT, CLM



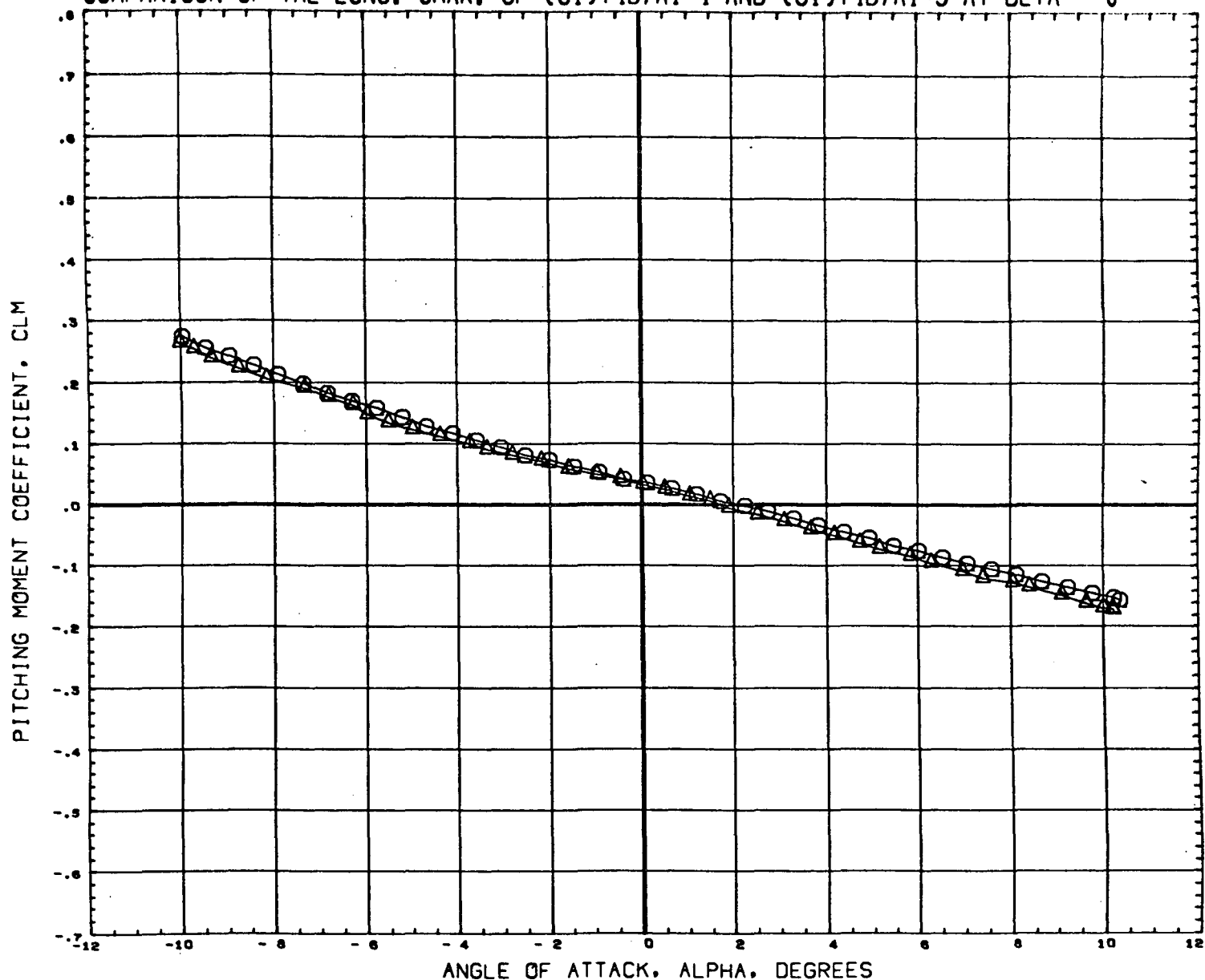
ANGLE OF ATTACK, ALPHA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

PAGE 531

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

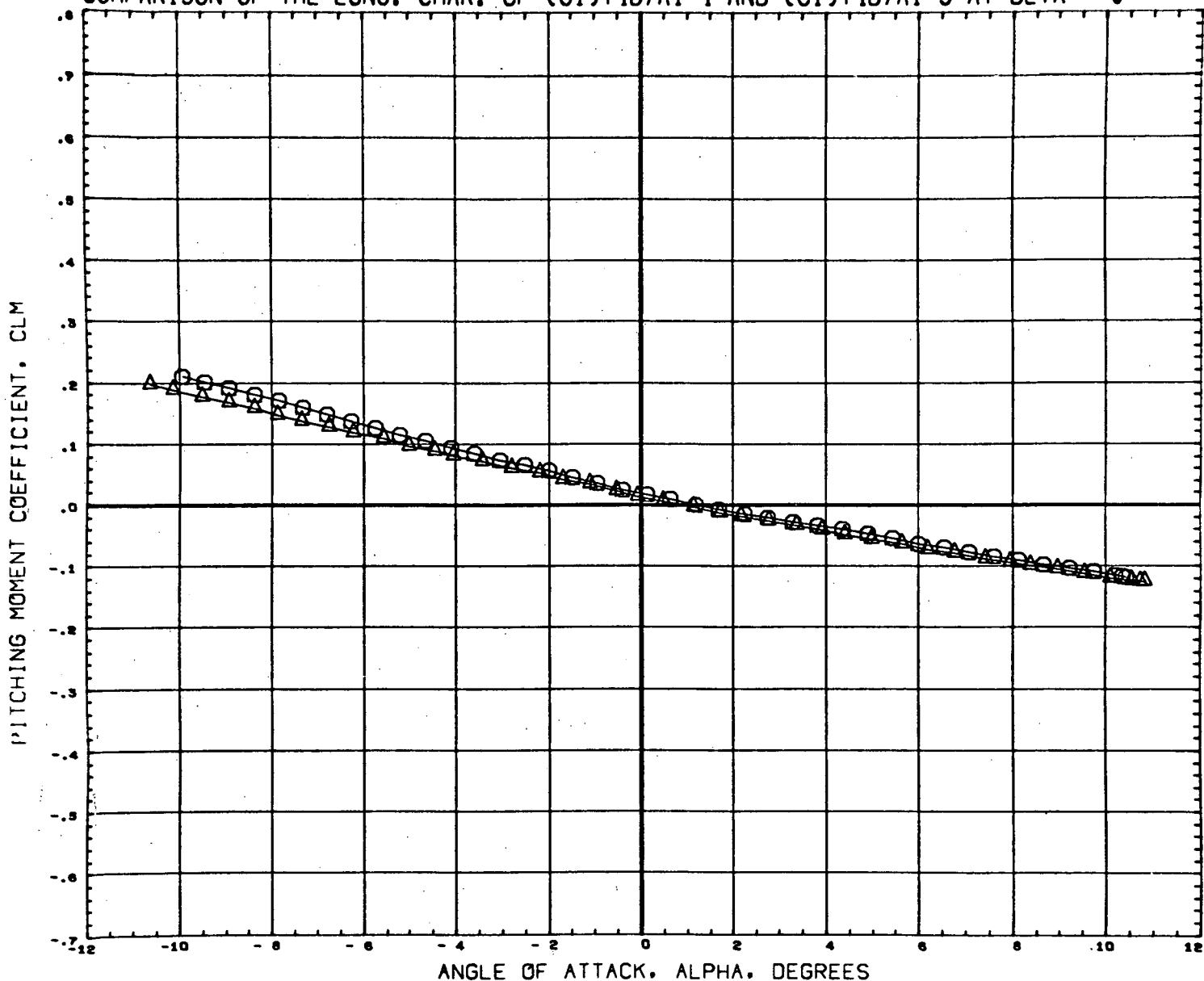


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.51

PAGE 532

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

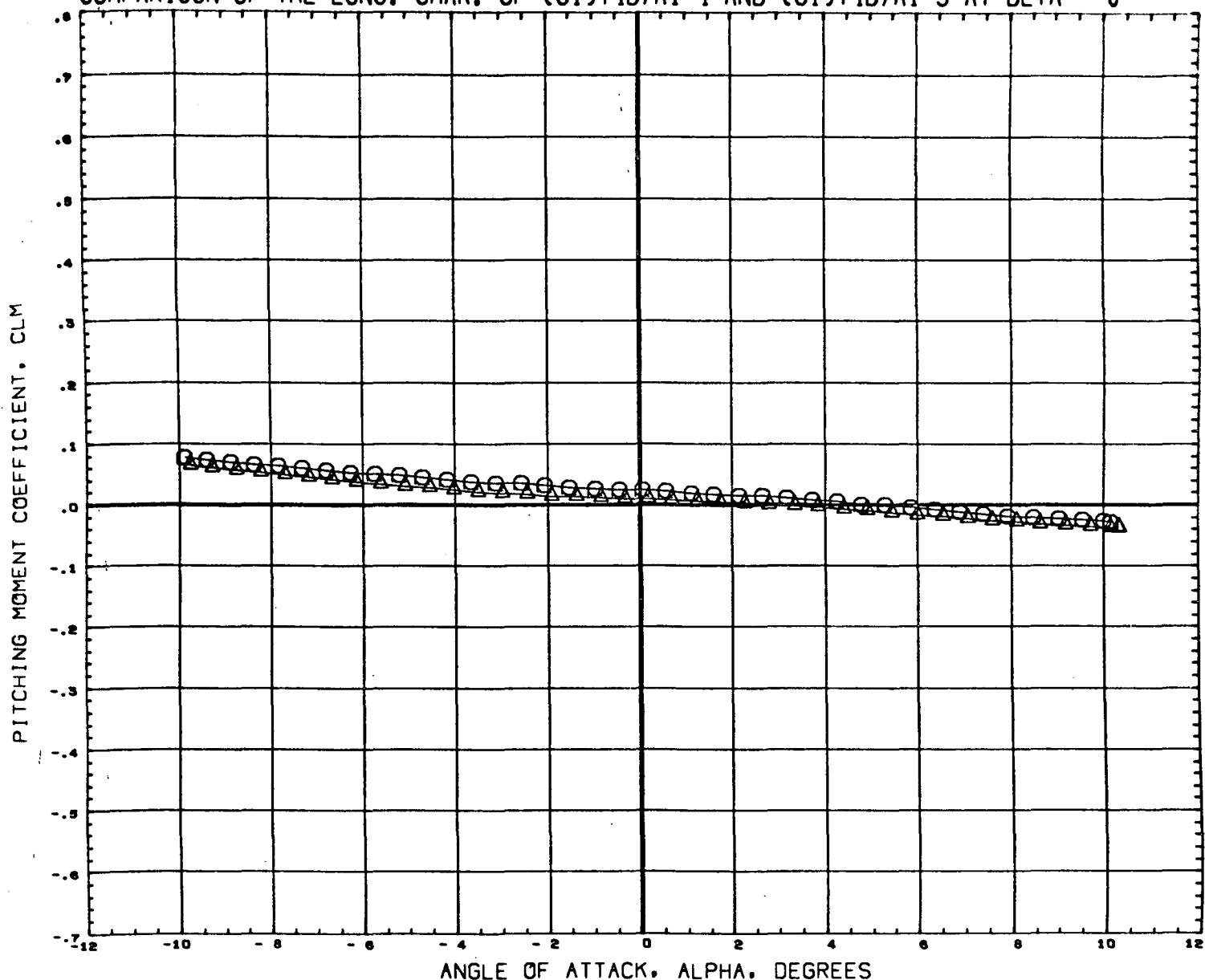


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

PAGE 533

COMPARISON OF THE LONG. CHAR. OF (O1)T4B7A1-4 AND (O1)T4B7A1-5 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) (O1)T4B7A1-4
(CD74E4) (O1)T4B7A1-5

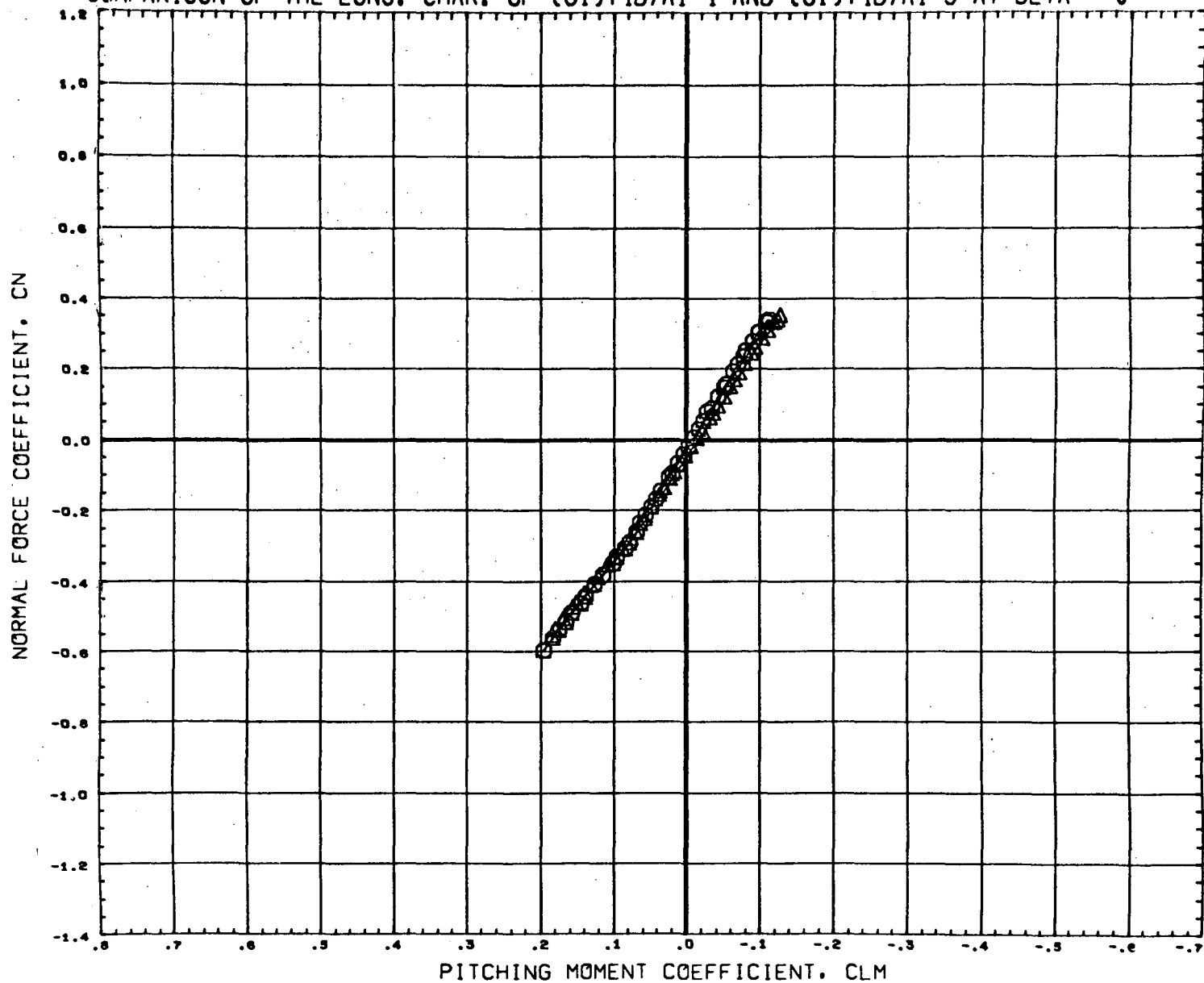
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | |
|-----------------------|------------------|
| SREF | 3155.3040 SQ.FT. |
| LREF | 609.5004 IN. |
| BREF | 882.0004 IN. |
| XMRP | 557.0004 IN. |
| YMRP | 0.0000 IN. |
| ZMRP | 200.0004 IN. |
| SCALE | 0.0060 SCALE |

MACH 4.47

PAGE 534

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



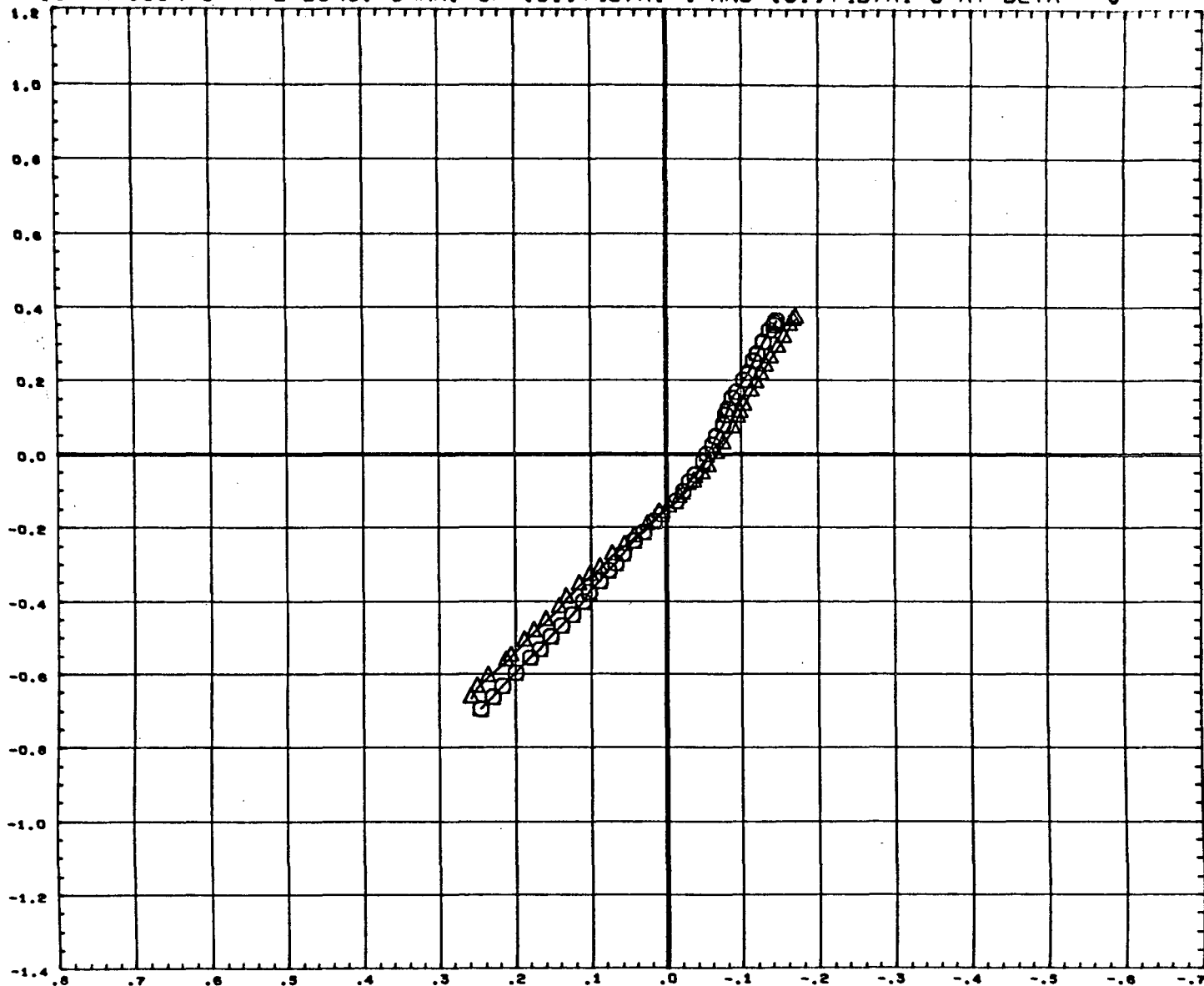
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 682.0004 IN. |
| | | | | | | XMRP | 537.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

PAGE 535

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

NORMAL FORCE COEFFICIENT, CN



PITCHING MOMENT COEFFICIENT, CLM

DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) (01)T4B7A1-4
(CD74E4) (01)T4B7A1-5

BETA 0.000
ELEVTR 0.000
AILRON 0.000
RUDDER 0.000

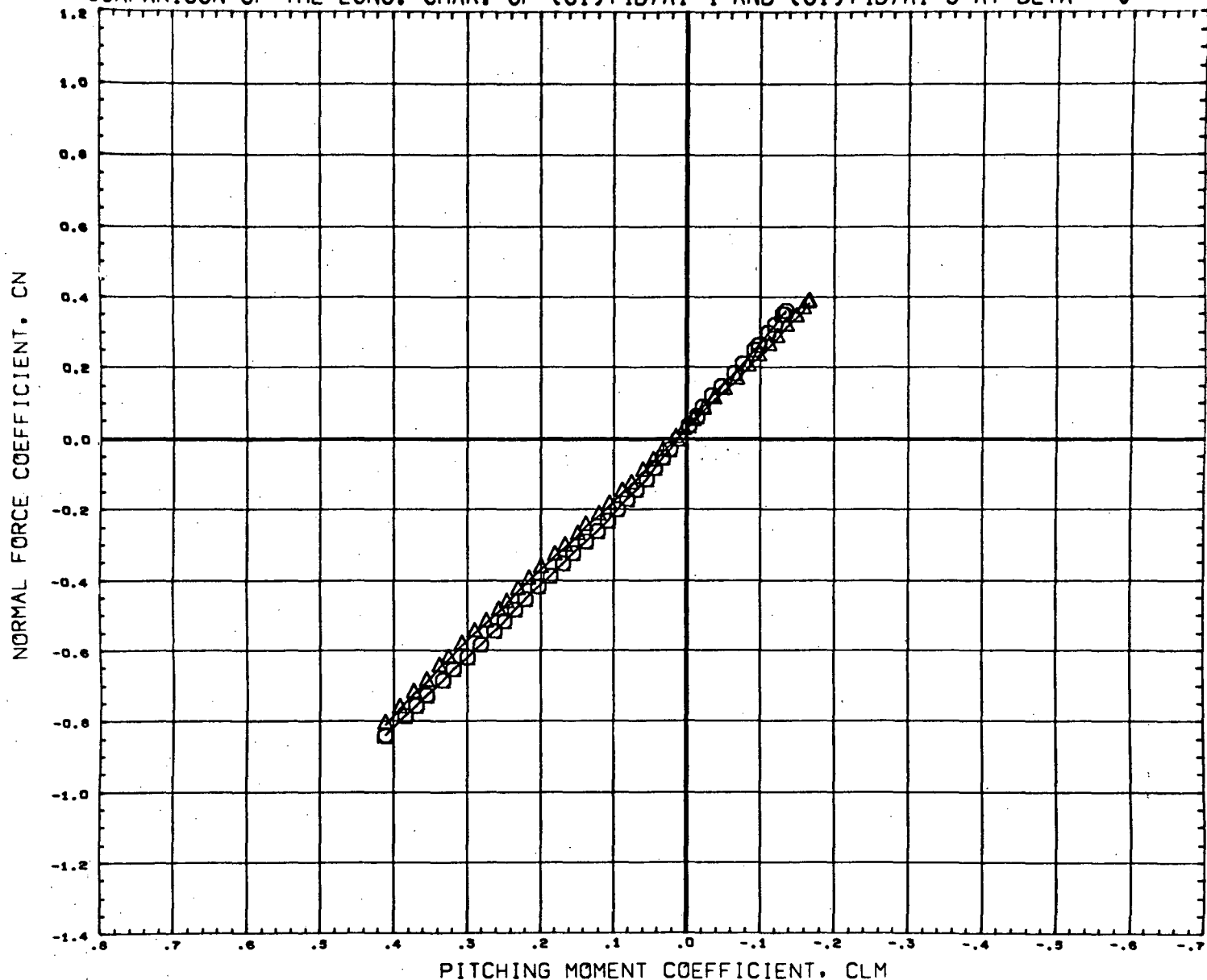
REFERENCE INFORMATION
SREF 3195.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060 SCALE

MACH

.90

PAGE 536

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

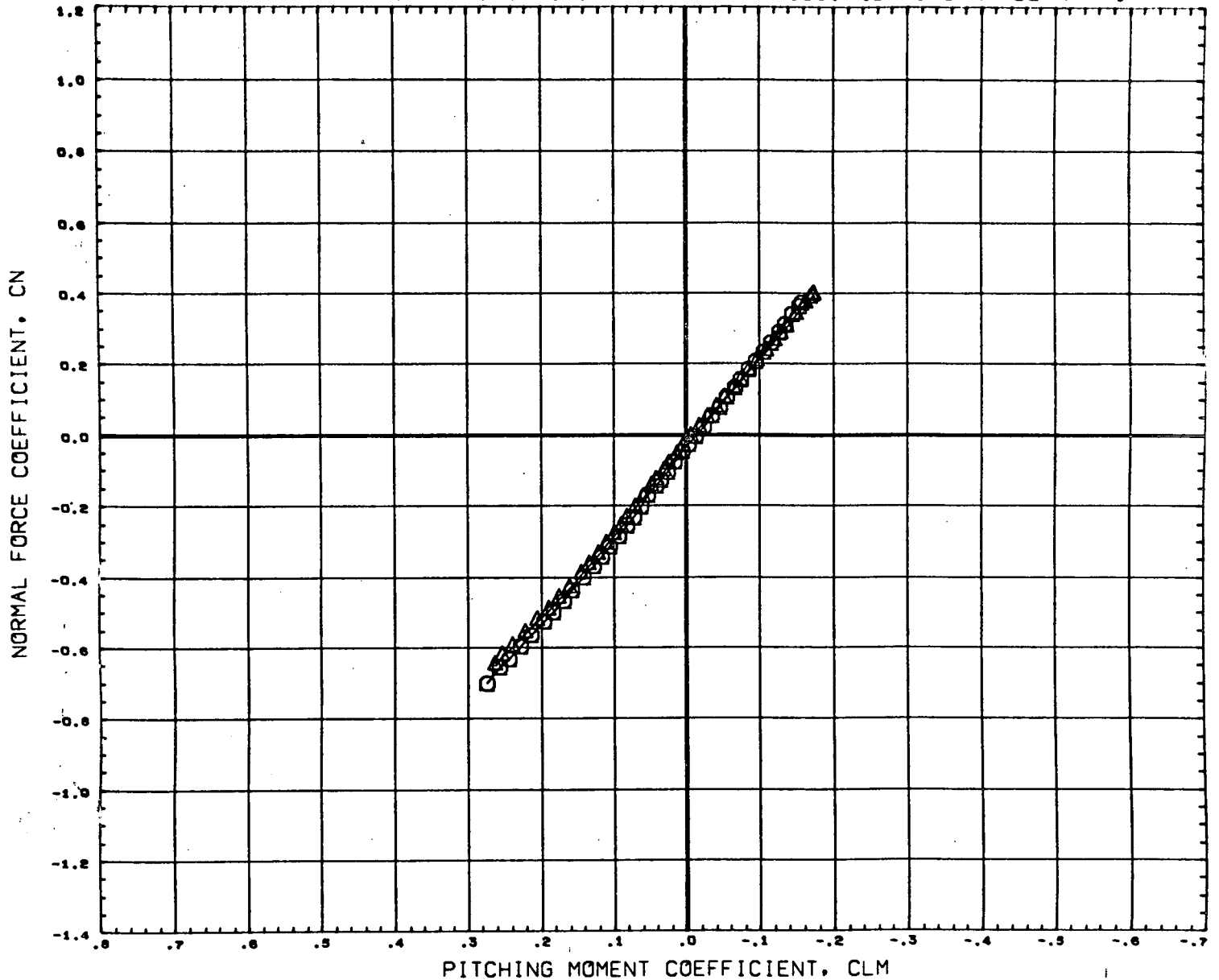


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (C074C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (C074E4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.3004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |



MACH 1.08

PAGE 537

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
(CD74E4)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

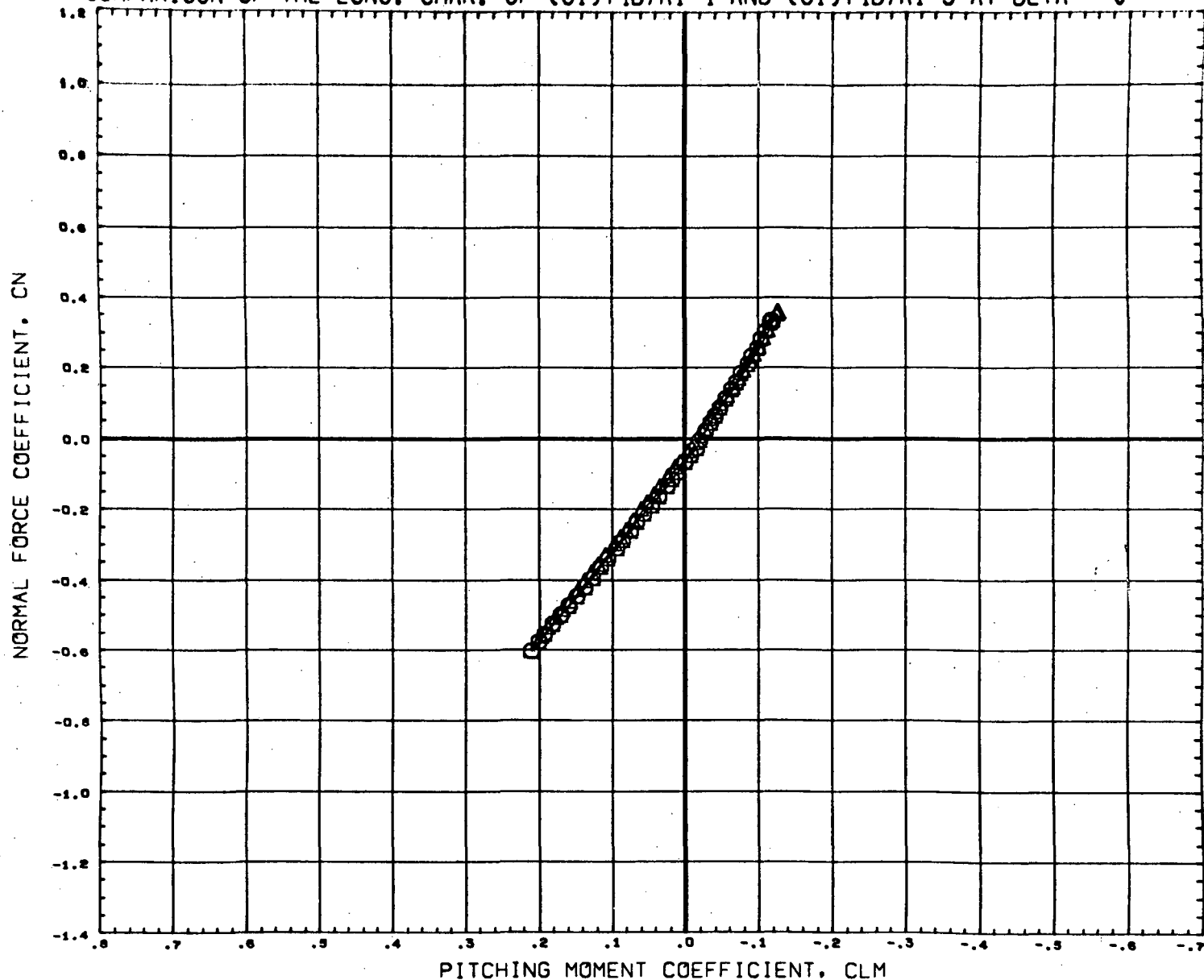
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH

1.51

PAGE 538

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



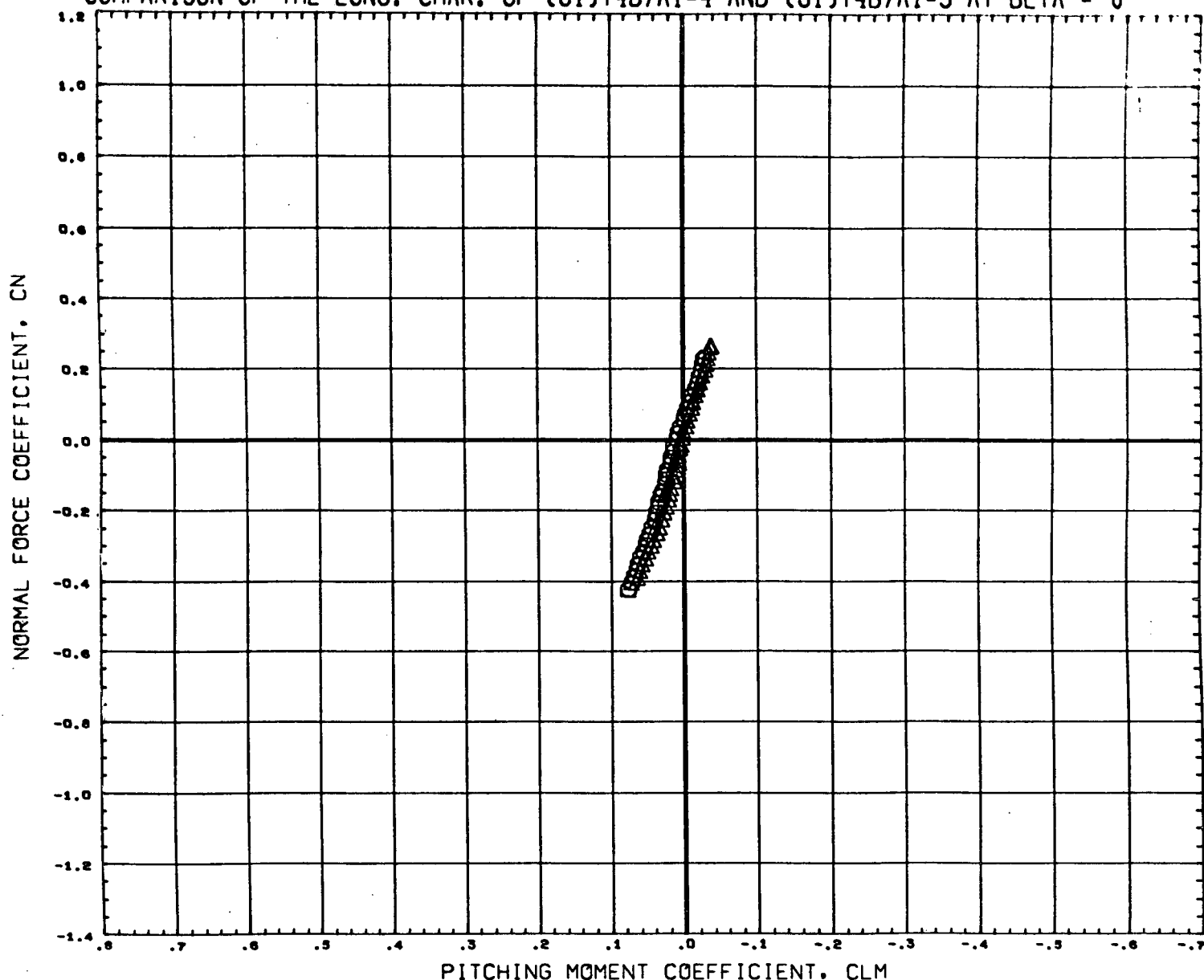
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRF | 557.0004 IN. |
| | | | | YMRF | 0.0000 IN. |
| | | | | ZMRF | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 2.20

PAGE 539

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
 (CD74E4) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

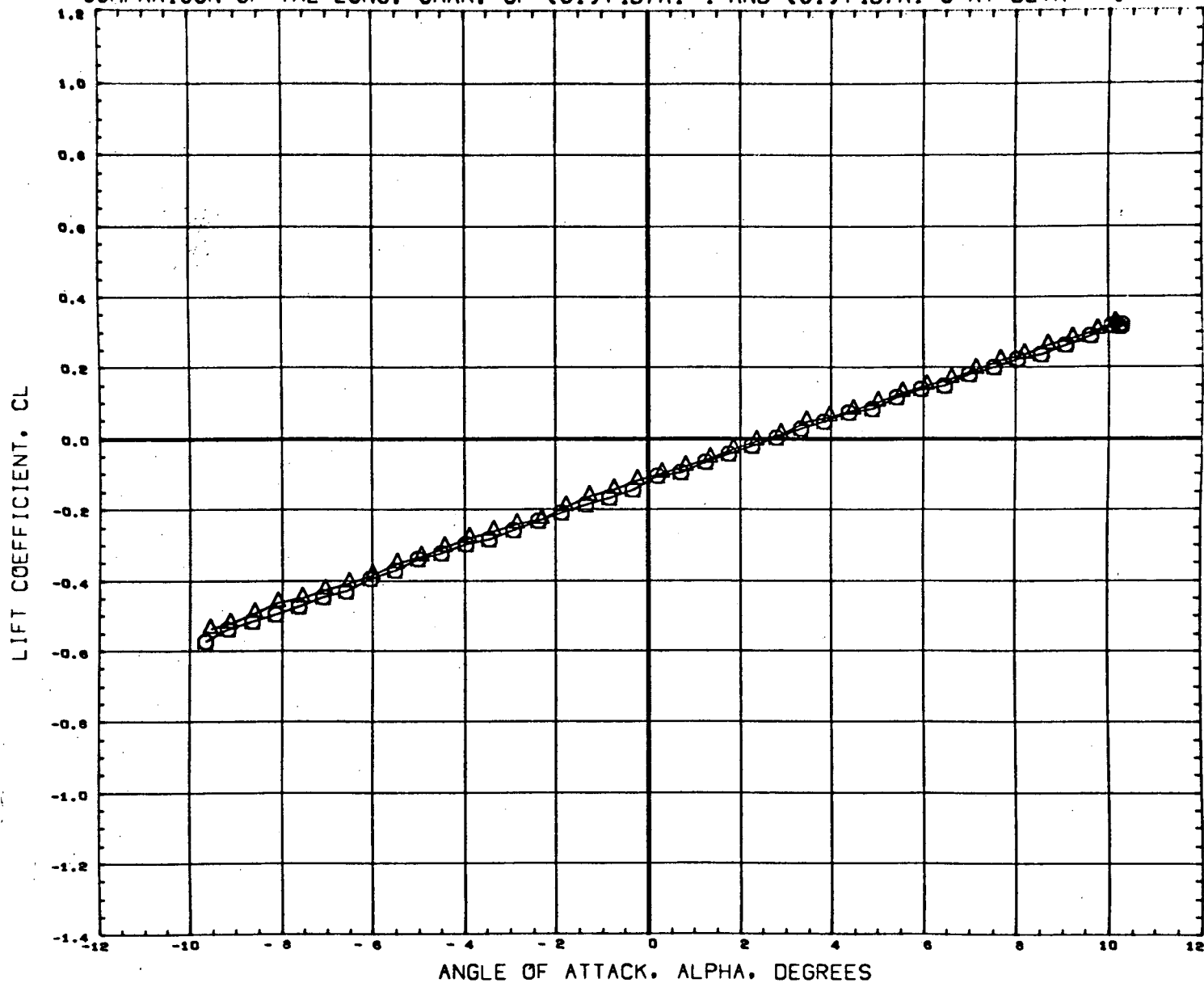
| REFERENCE INFORMATION | |
|-----------------------|------------------|
| SREF | 3155.3040 SQ.FT. |
| LREF | 609.5004 IN. |
| BREF | 882.0004 IN. |
| XMRP | 557.0004 IN. |
| YMRP | 0.0000 IN. |
| ZMRP | 200.0004 IN. |
| SCALE | 0.0060 SCALE |

MACH



4.47

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COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74E4)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

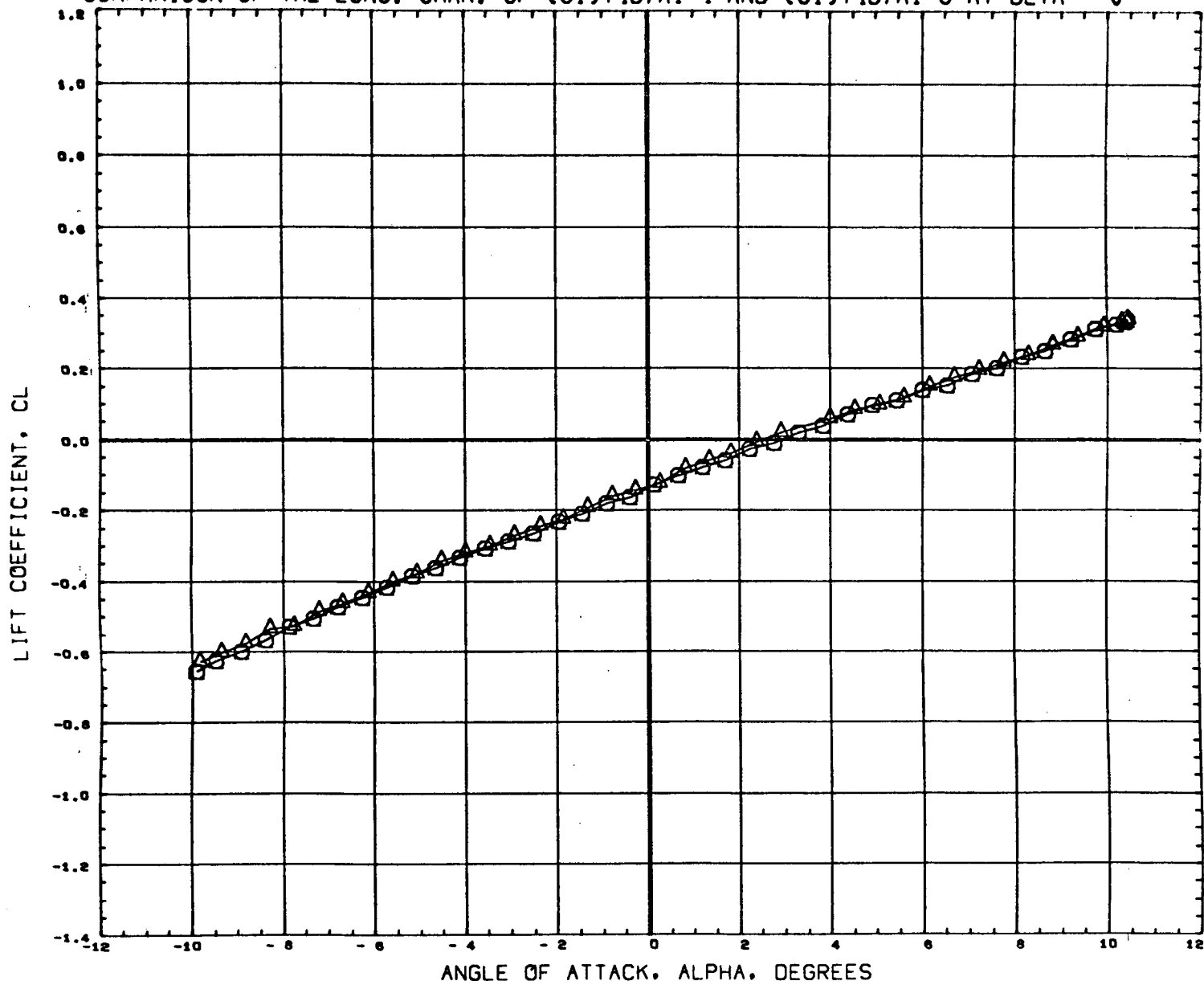
REFERENCE INFORMATION

| | | |
|-------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRF | 557.0004 | IN. |
| YMRF | 0.0000 | IN. |
| ZMRF | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH .58

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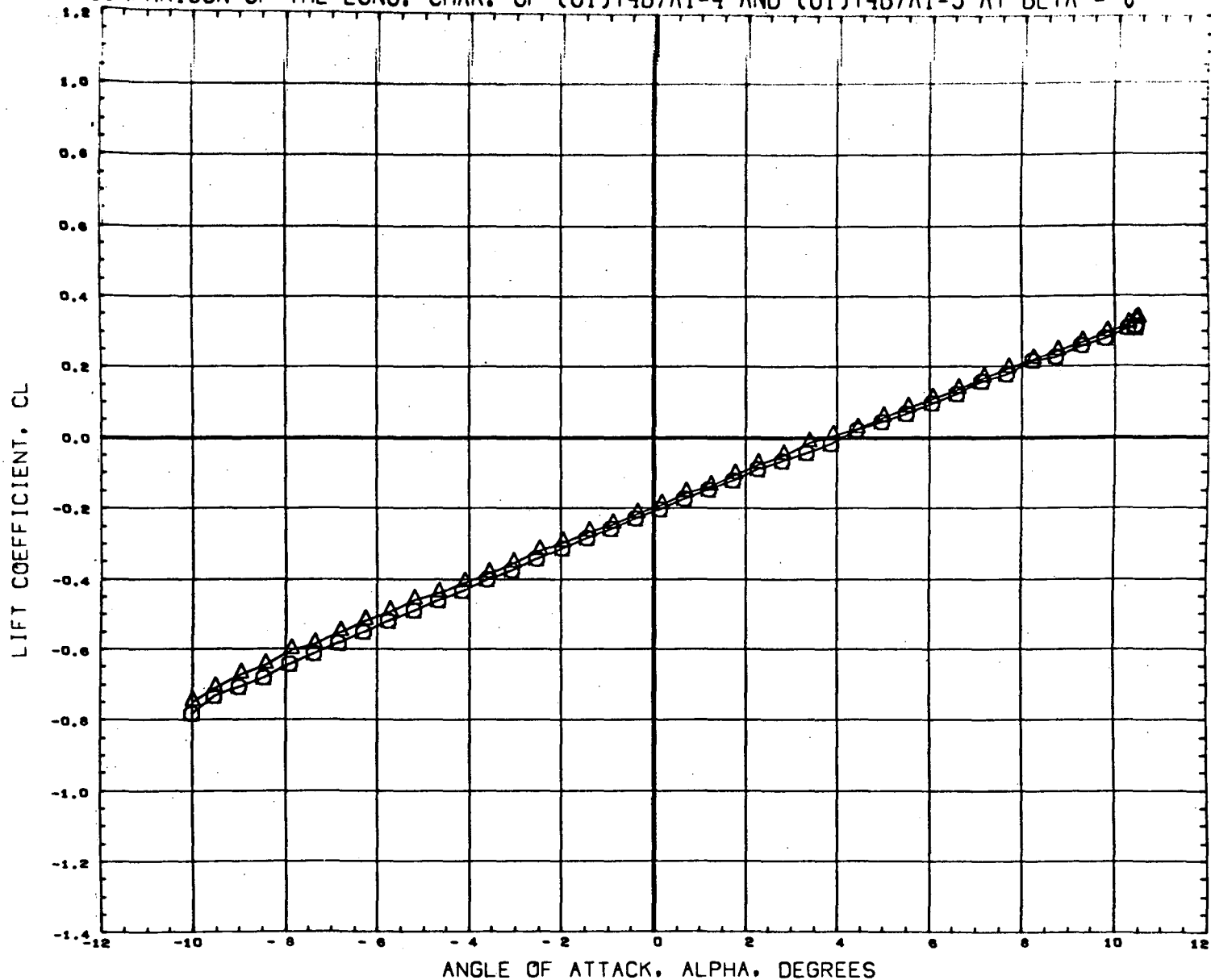
COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) (01)T4B7A1-4
(CD74E4) (01)T4B7A1-5

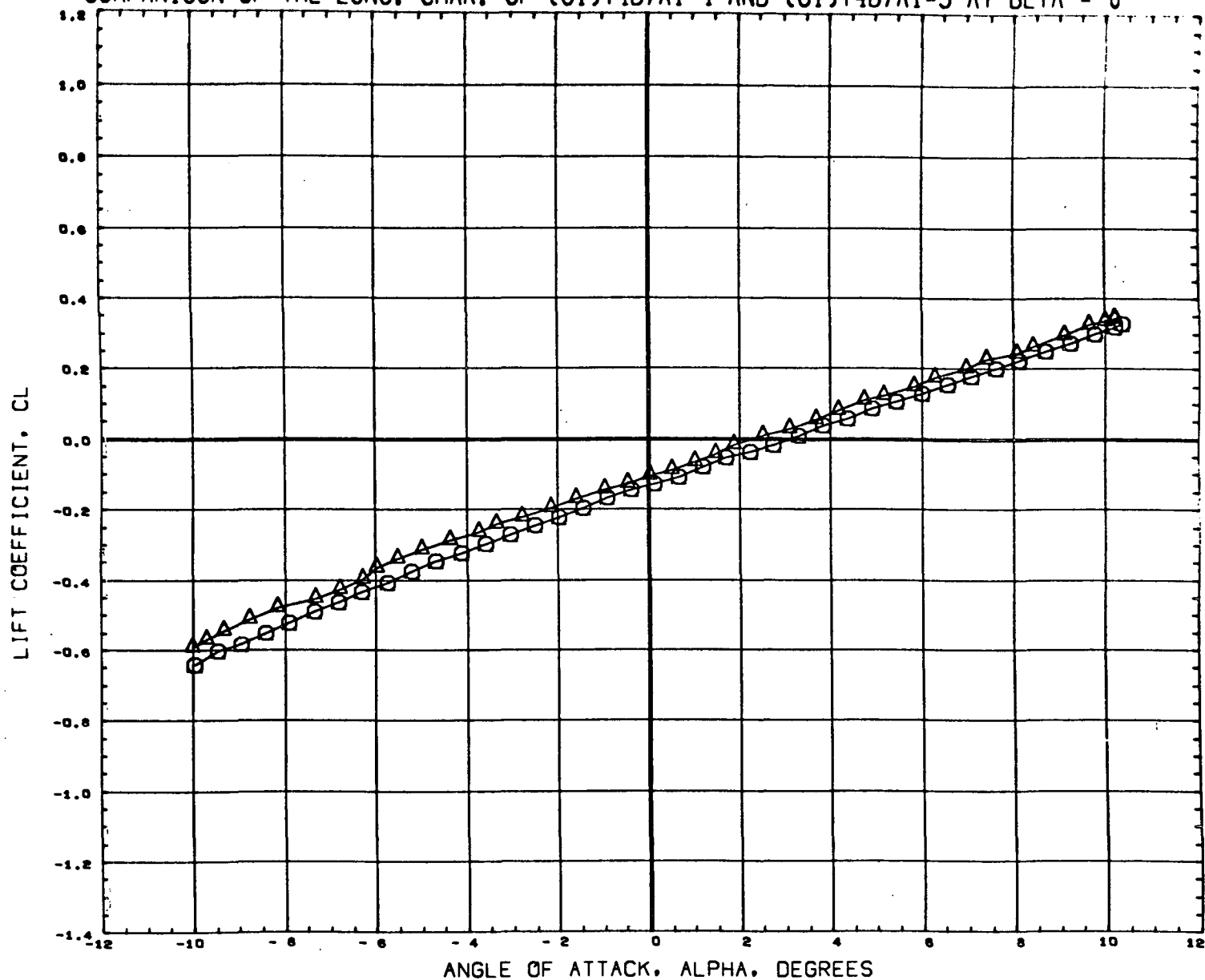
BETA ELEVTR AILRON RUDDER
0.000 0.000 0.000 0.000
0.000 0.000 0.000 0.000

REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060 SCALE

MACH 1.08

PAGE 543

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



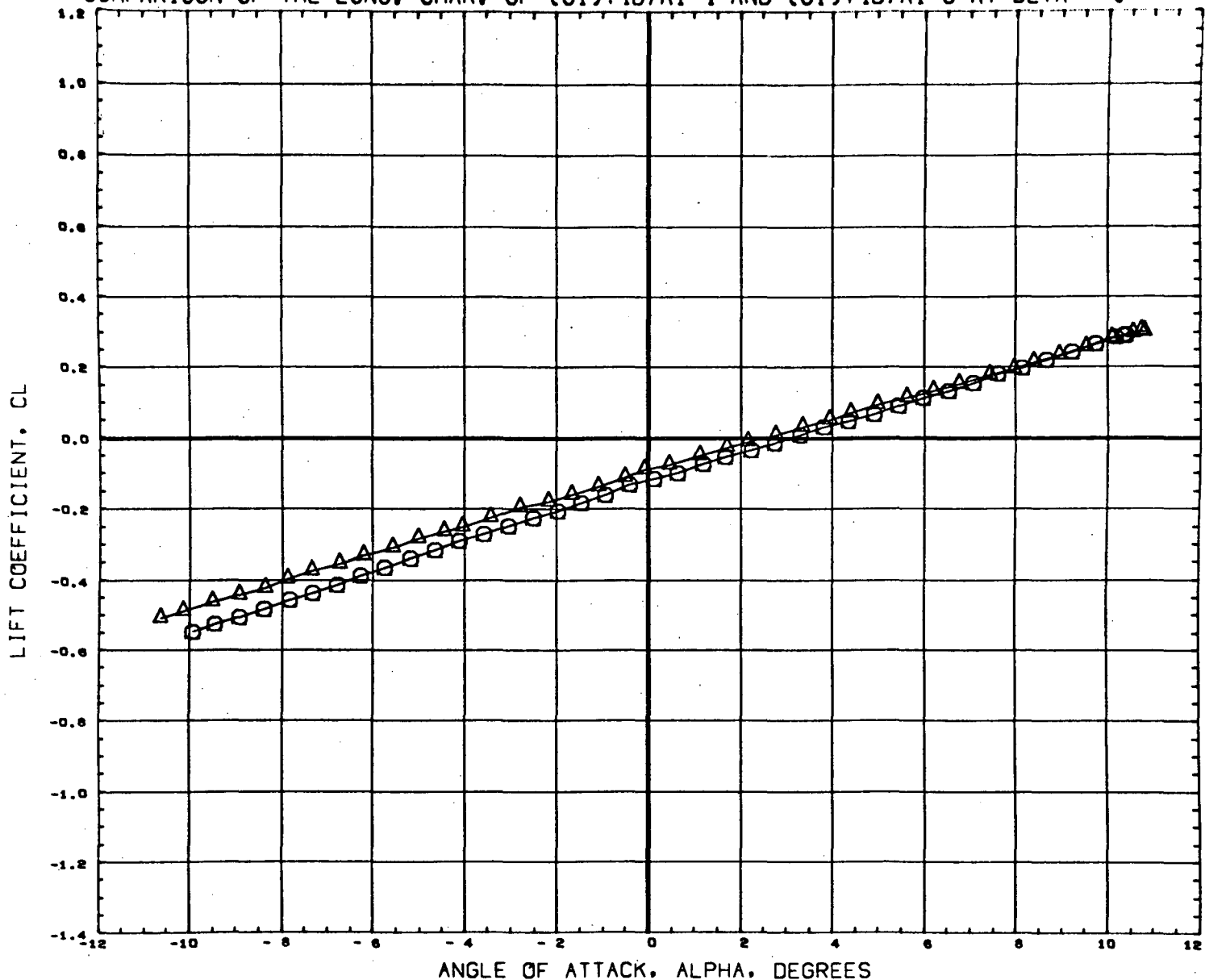
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH

1.51

PAGE 544

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

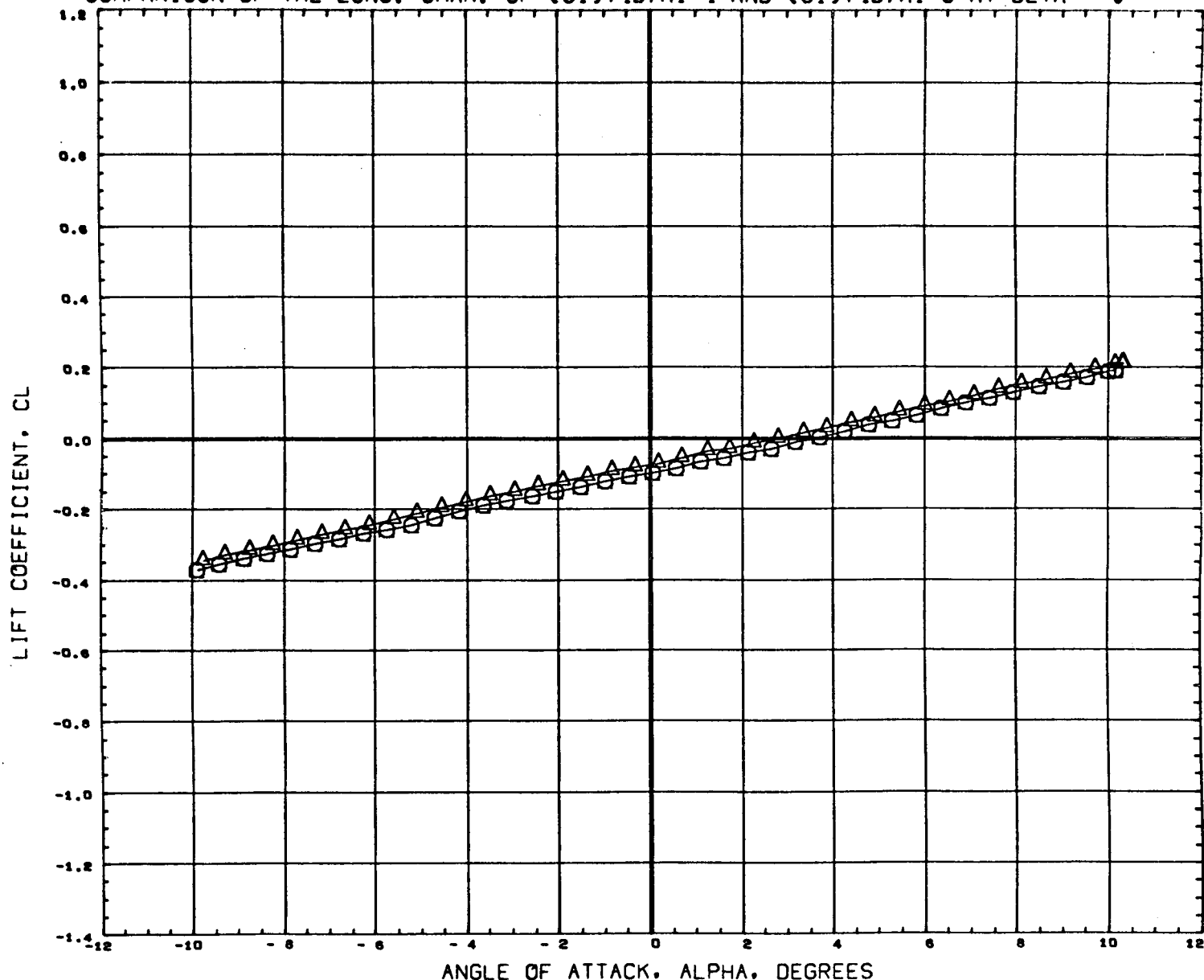


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

PAGE 545

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



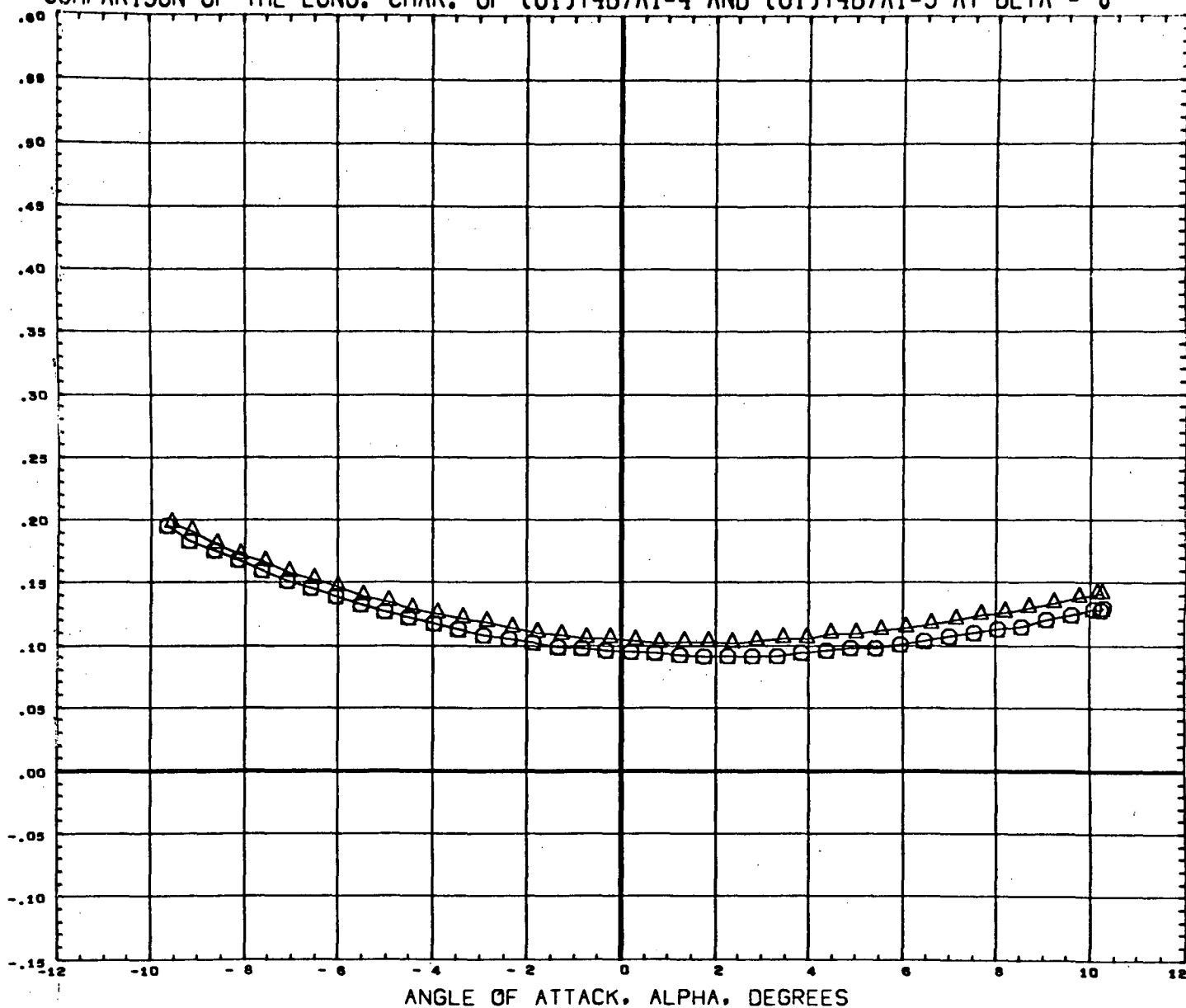
| DATA SET | SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|----------|--------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | ○ | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | △ | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | | BREF | 882.0004 IN. |
| | | | | | | | XMRP | 937.0004 IN. |
| | | | | | | | YMRP | 0.0000 IN. |
| | | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

PAGE 546

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) (01)T4B7A1-4
(CD74E4) (01)T4B7A1-5

BETA ELEVTR AILRON RUDDER
0.000 0.000 0.000 0.000
0.000 0.000 0.000 0.000

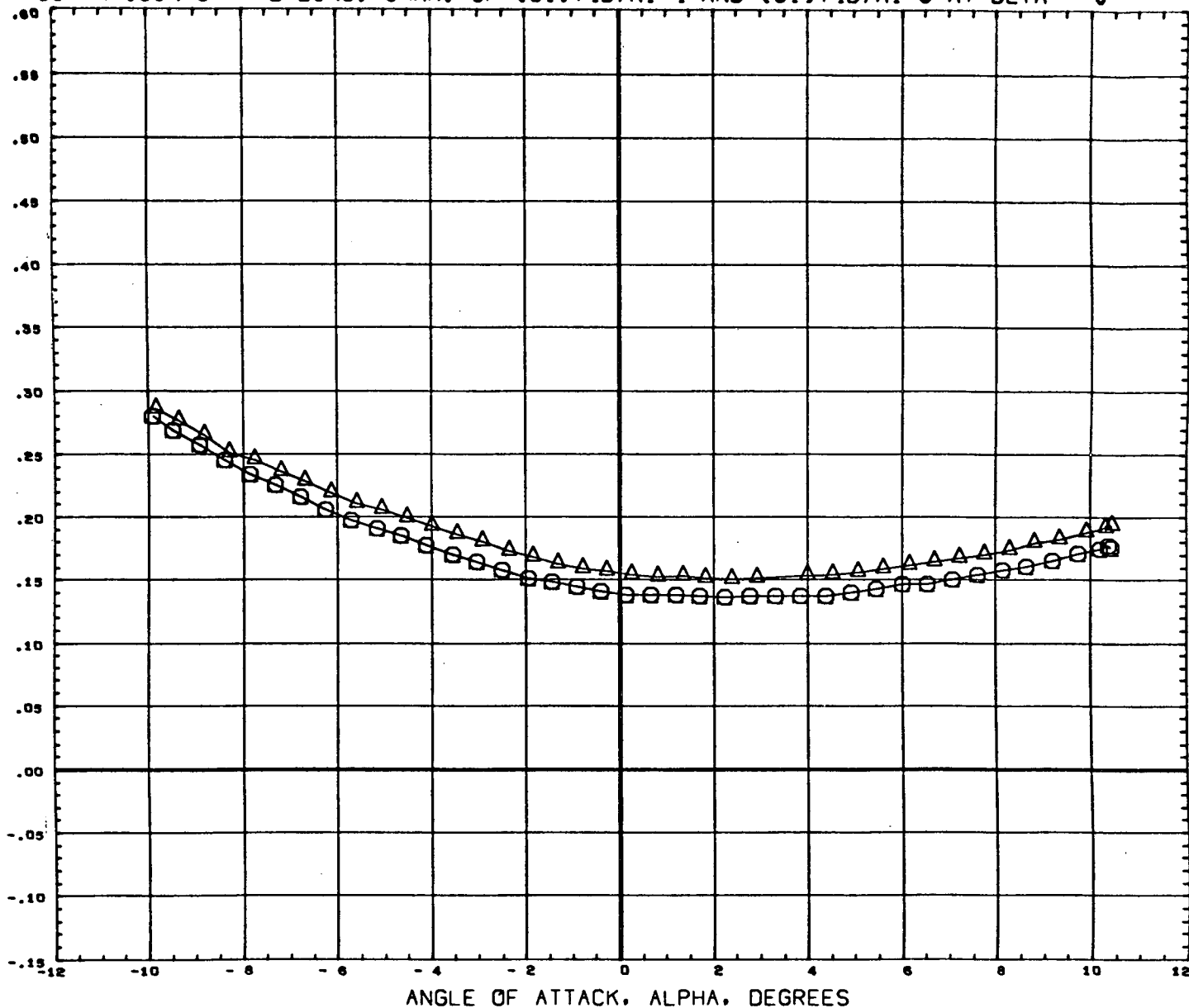
REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060 SCALE

MACH .58

PAGE 547

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



ANGLE OF ATTACK, ALPHA, DEGREES

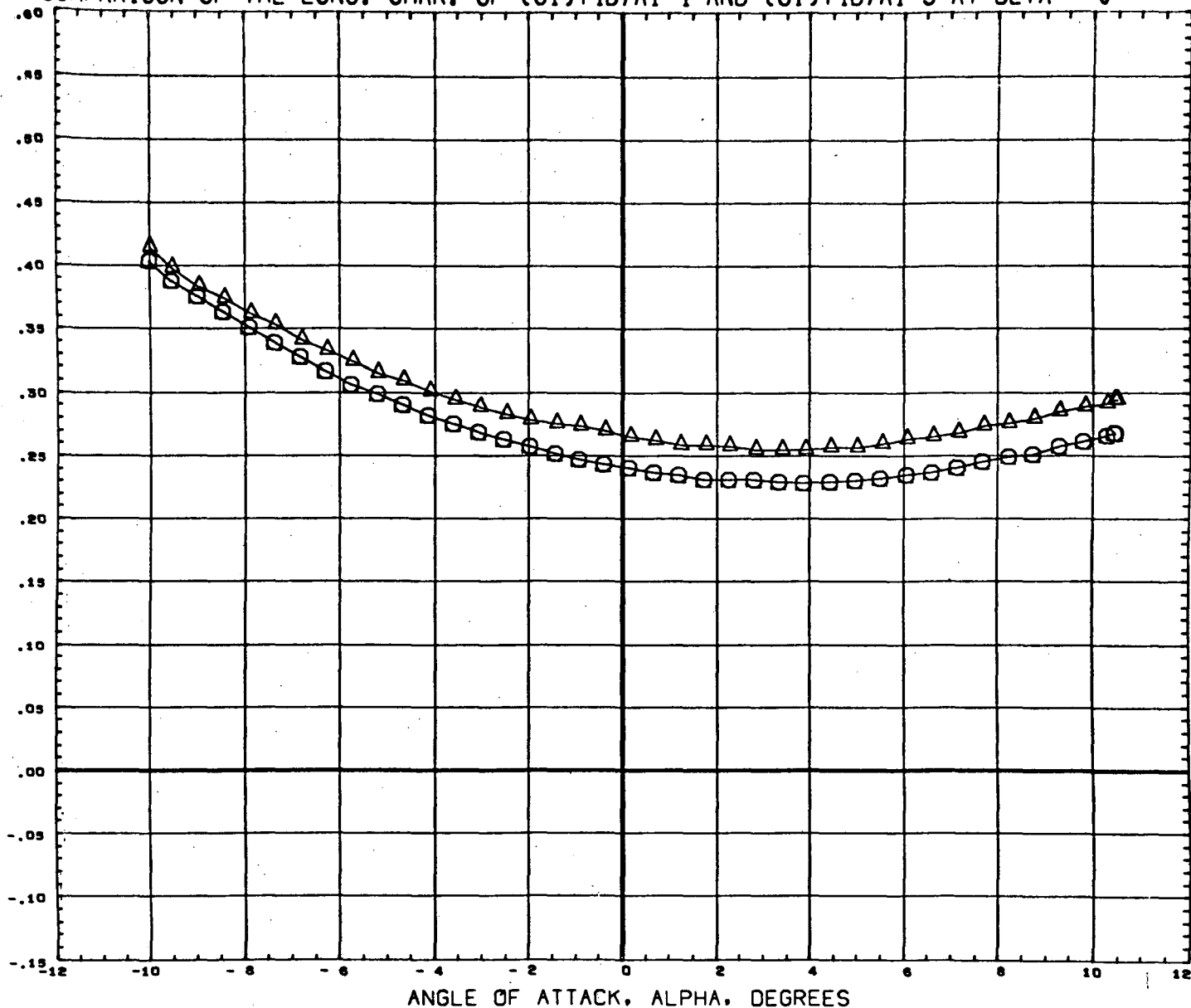
| DATA SET | SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|----------|--------|---|-------|--------|--------|--------|-----------------------|-----------|--------|
| (C074C7) | ○ | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| (C074E4) | △ | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.3004 | IN. |
| | | | | | | | BREF | 882.0004 | IN. |
| | | | | | | | XMRP | 557.0004 | IN. |
| | | | | | | | YMRP | 0.0000 | IN. |
| | | | | | | | ZMRP | 200.0004 | IN. |
| | | | | | | | SCALE | 0.0060 | SCALE |

MACH .90

PAGE 548

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
(CD74E4) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5

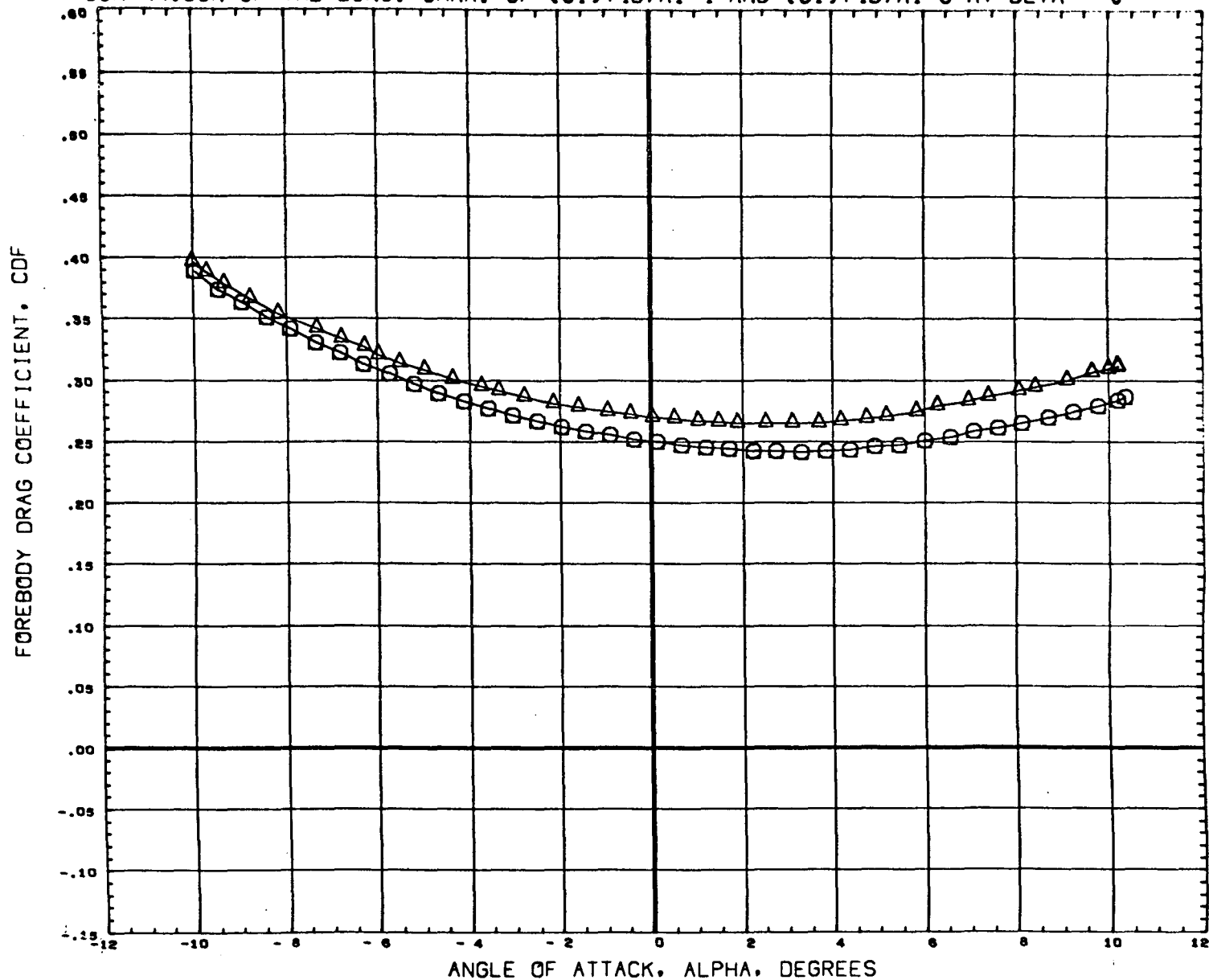
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 1.08

PAGE 549

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

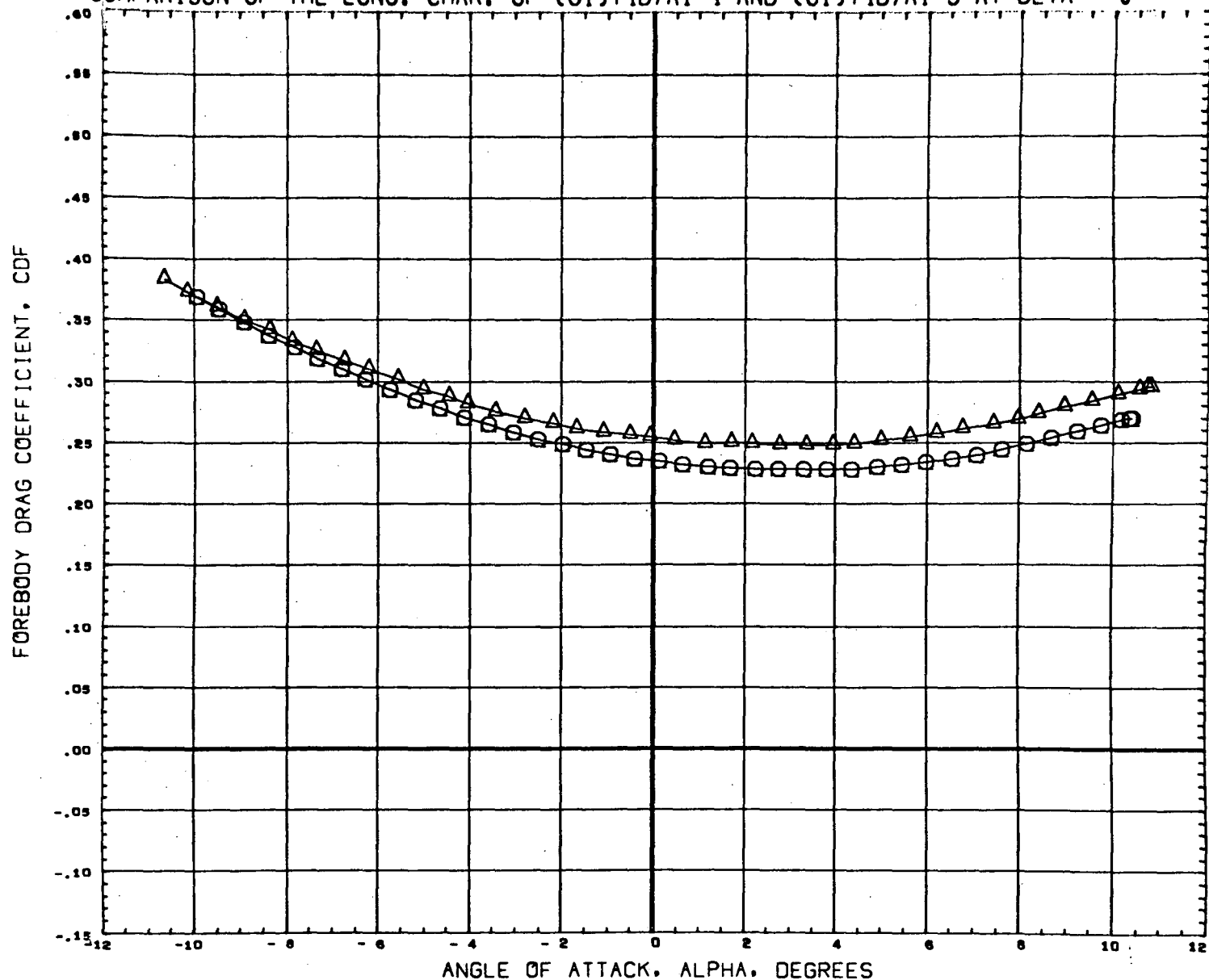


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRF | 557.0004 IN. |
| | | | | | | YMRF | 0.0000 IN. |
| | | | | | | ZMRF | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.51

PAGE 550

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



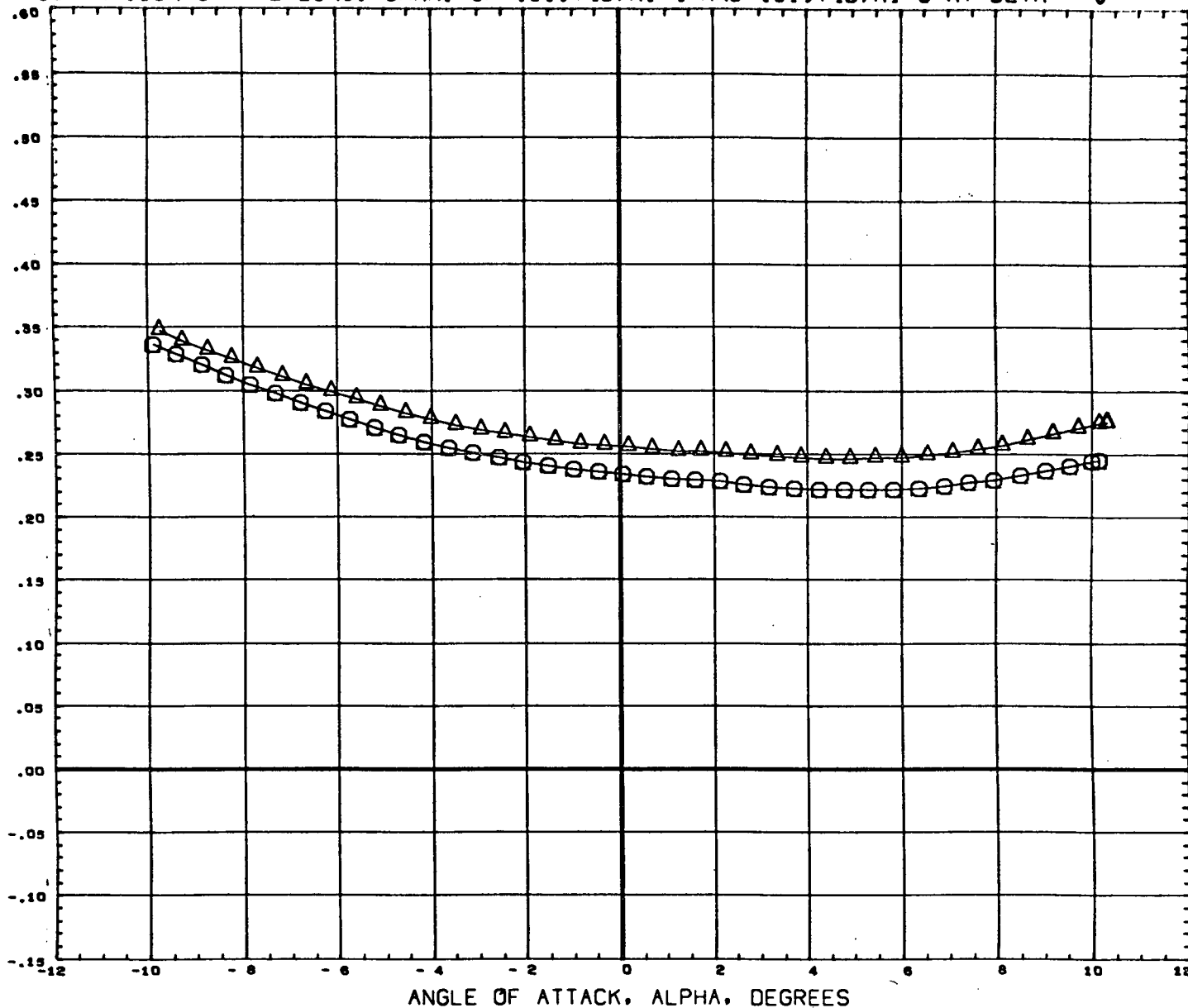
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | NDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | NDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.3004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 337.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

PAGE 551

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



ANGLE OF ATTACK, ALPHA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.3004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

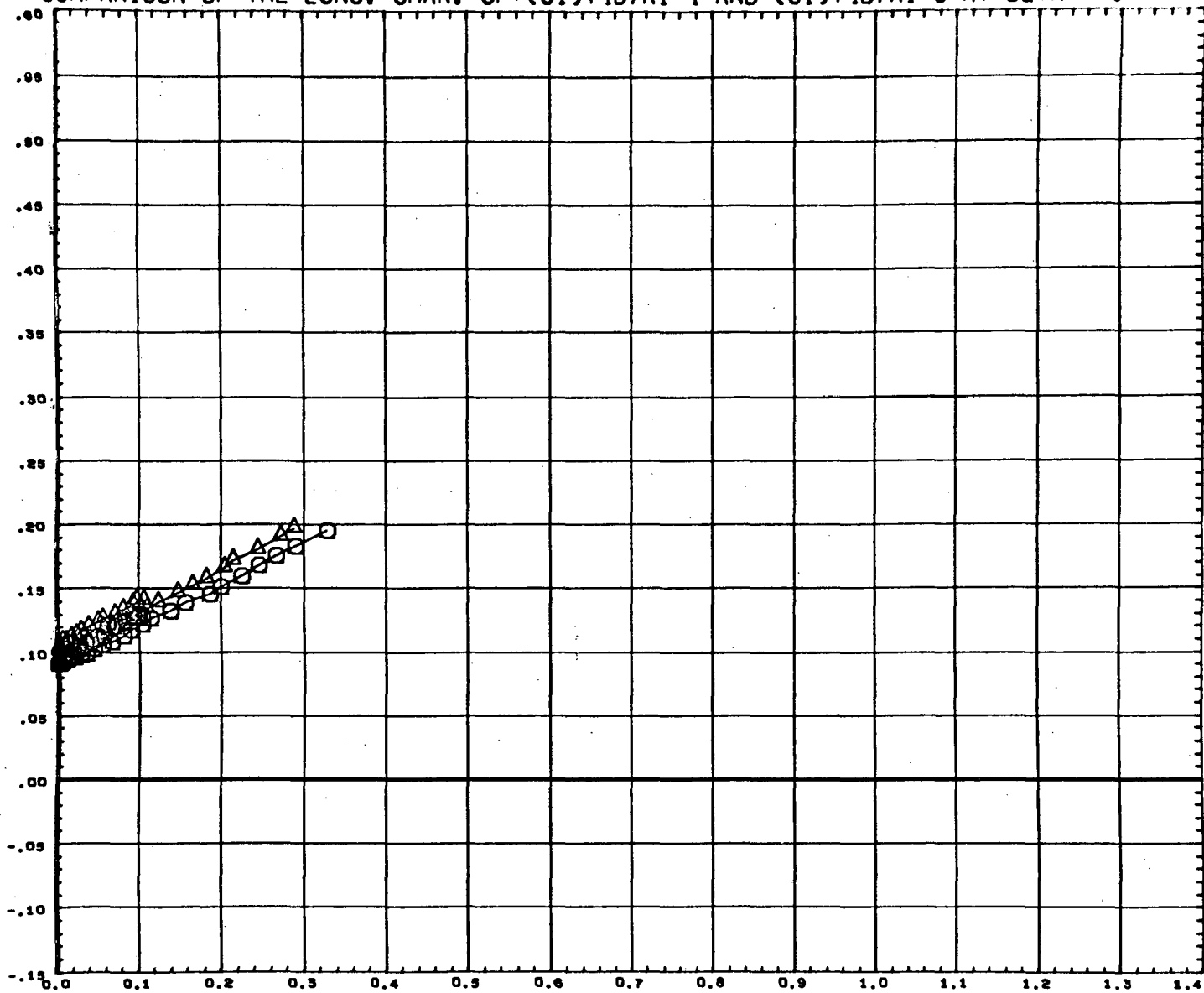
MACH

4.47

PAGE 552

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



LIFT COEFFICIENT SQUARED, CLSQR

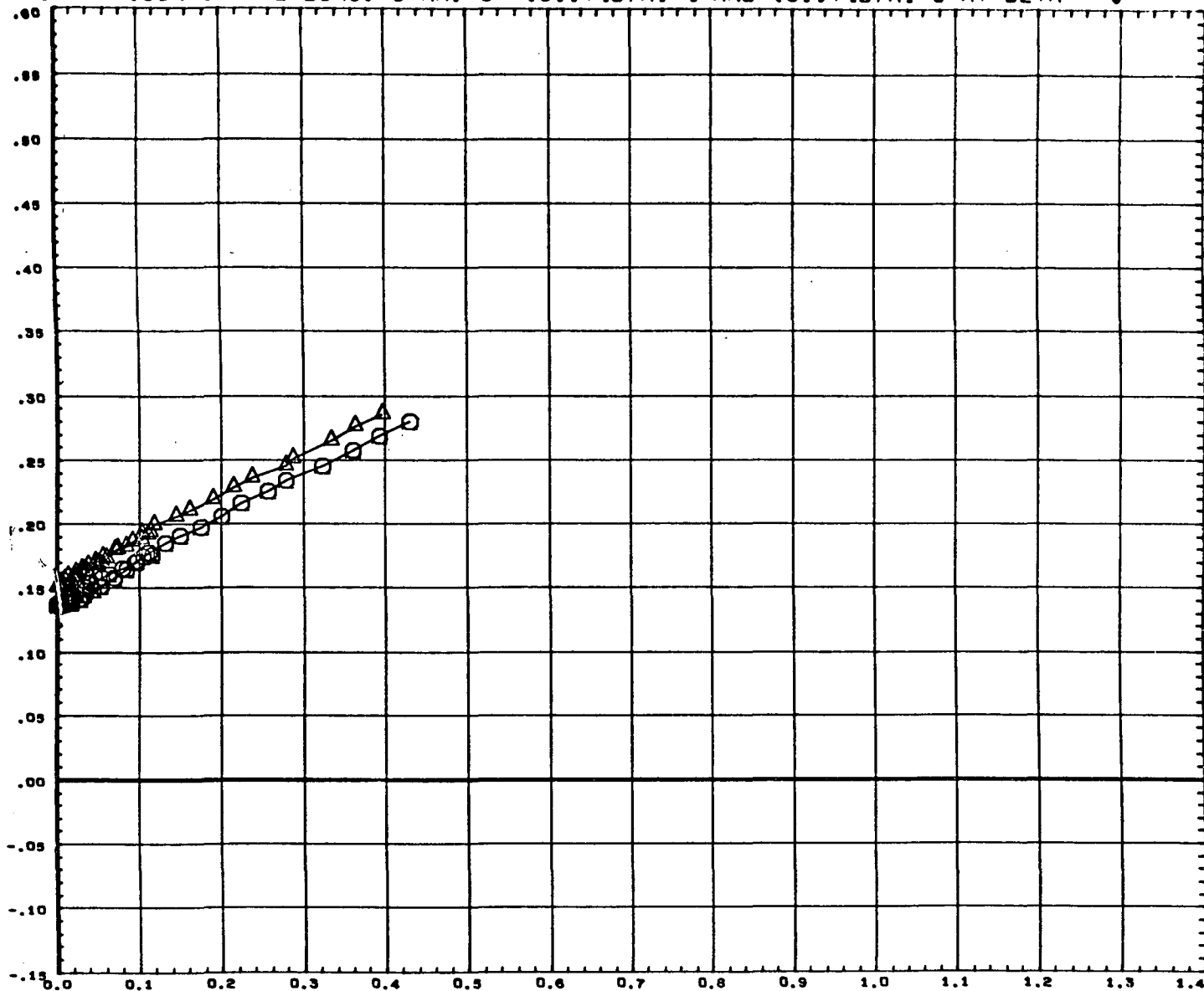
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

PAGE 553

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



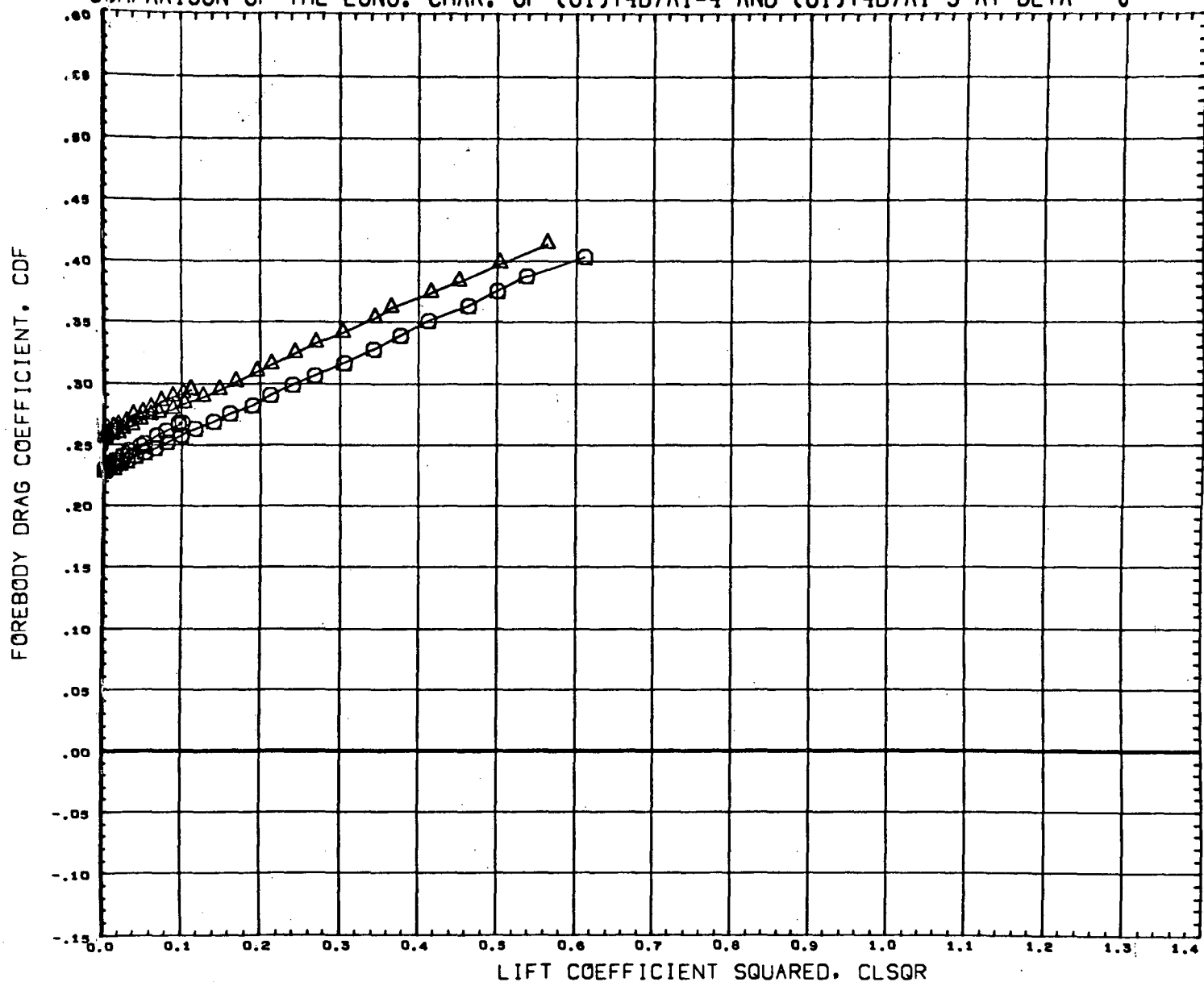
LIFT COEFFICIENT SQUARED, CLSQ

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 937.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

PAGE 554

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(C074C7) (01)T4B7A1-4
(C074E4) (01)T4B7A1-5

BETA ELEVTR AILRON RUDDER
0.000 0.000 0.000 0.000
0.000 0.000 0.000 0.000

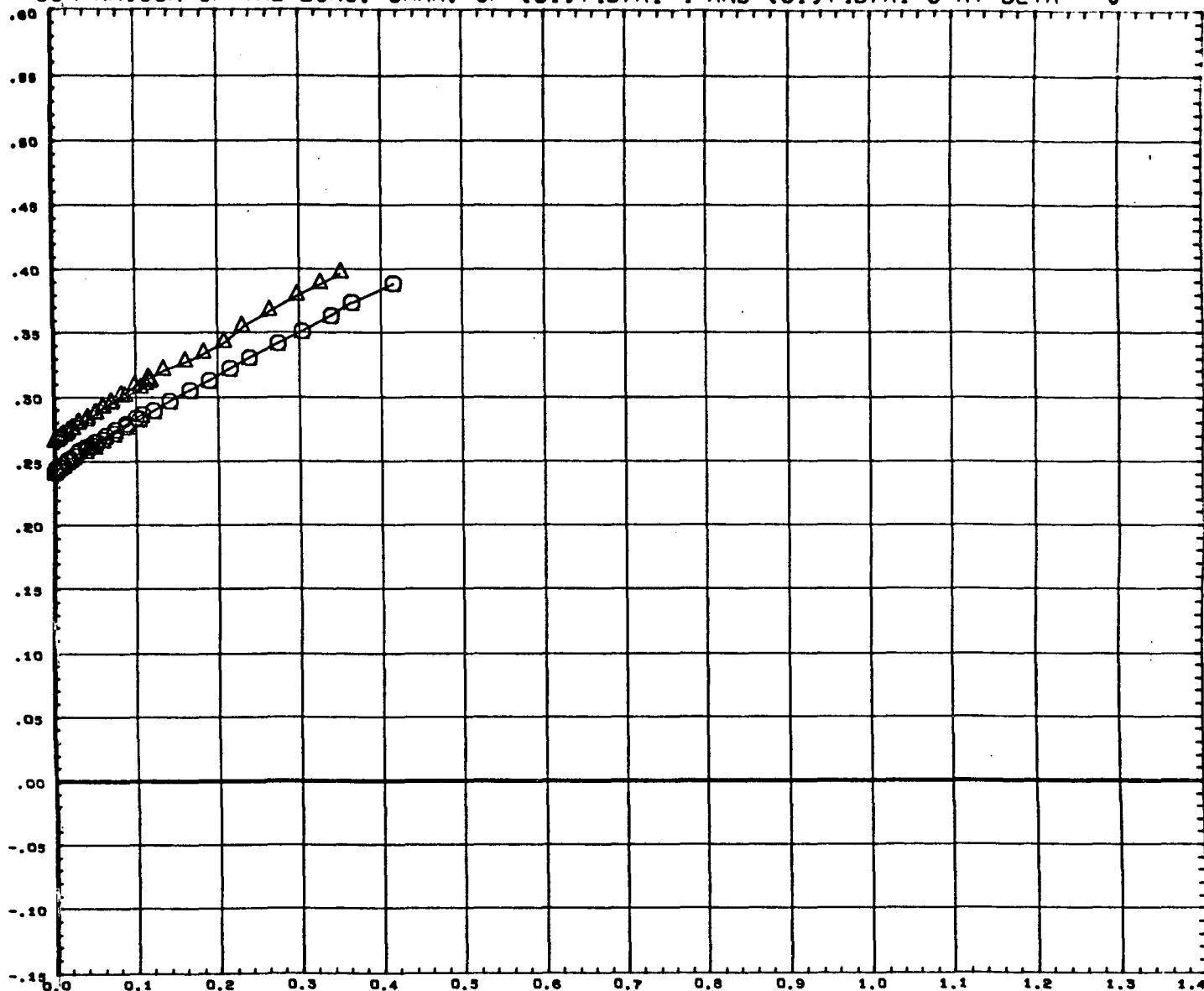
REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 682.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0080 SCALE

MACH 1.08

PAGE 555

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



LIFT COEFFICIENT SQUARED, CLSQR

DATA SET SYMBOL CONFIGURATION DESCRIPTION

(074C7) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
(074E4) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

BETA ELEVTR AILRON RUDDER

0.000 0.000 0.000 0.000
0.000 0.000 0.000 0.000

REFERENCE INFORMATION

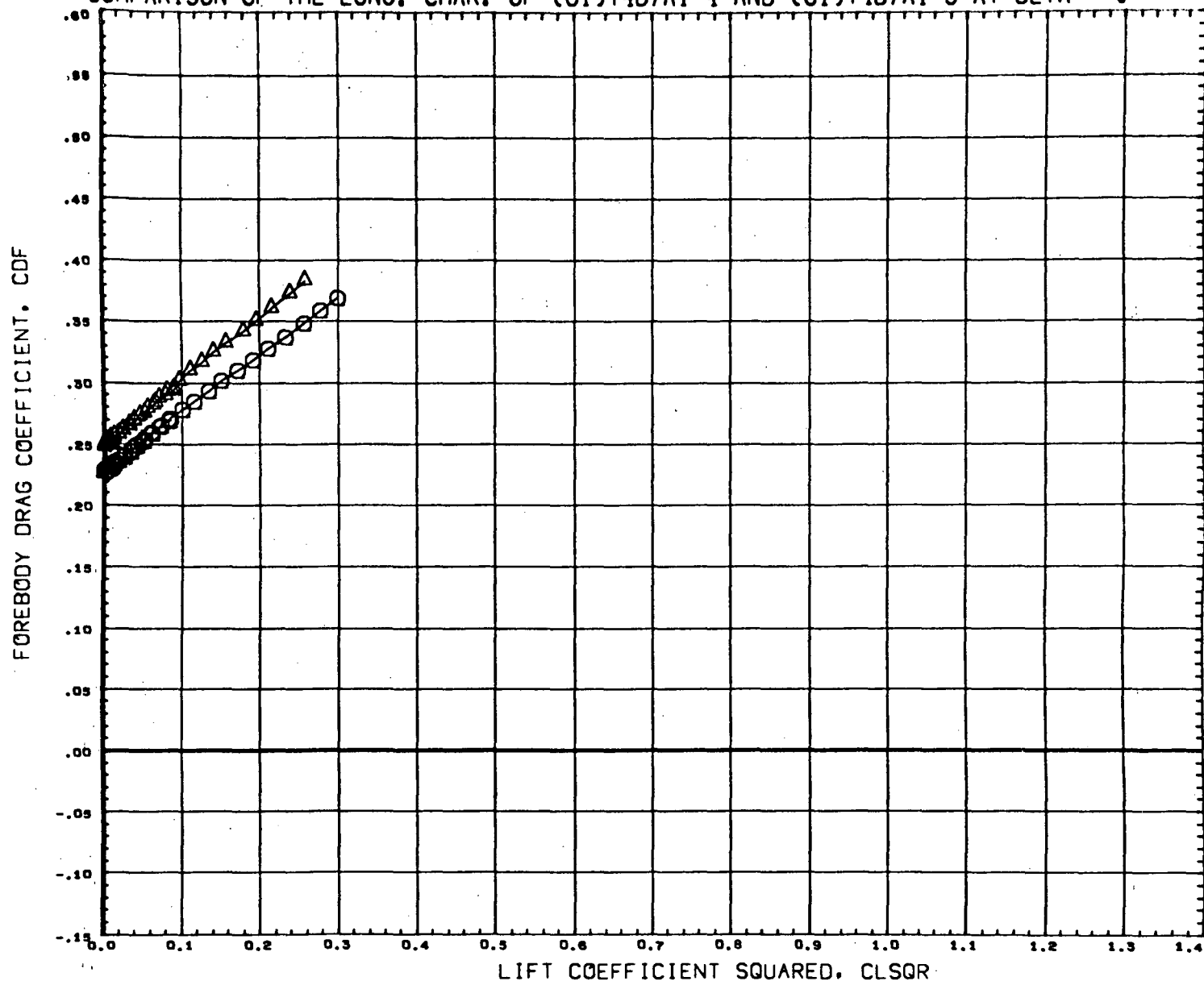
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060 SCALE

MACH

1.51

PAGE 556

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



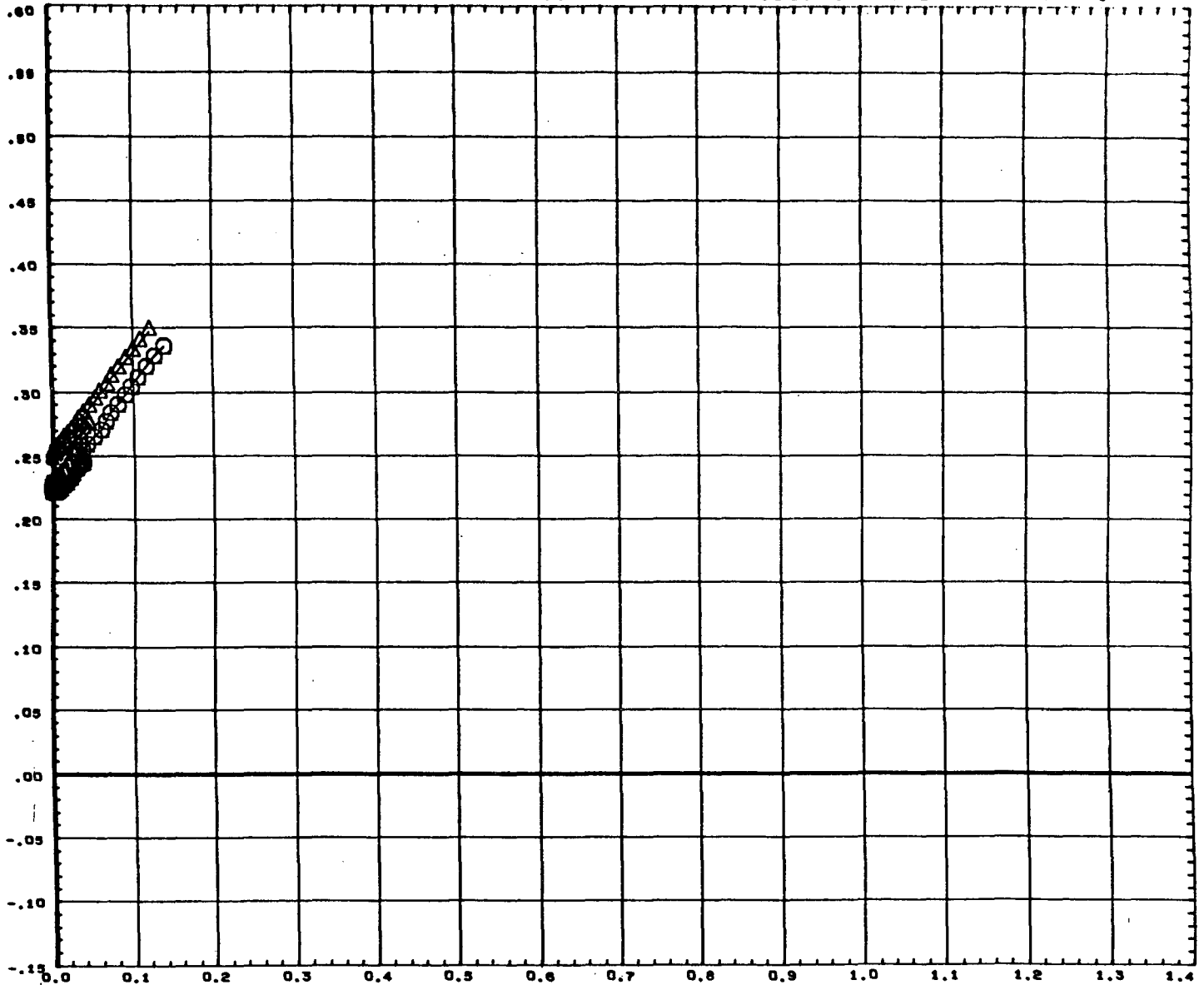
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

PAGE 557

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

FOREBODY DRAG COEFFICIENT, CDF



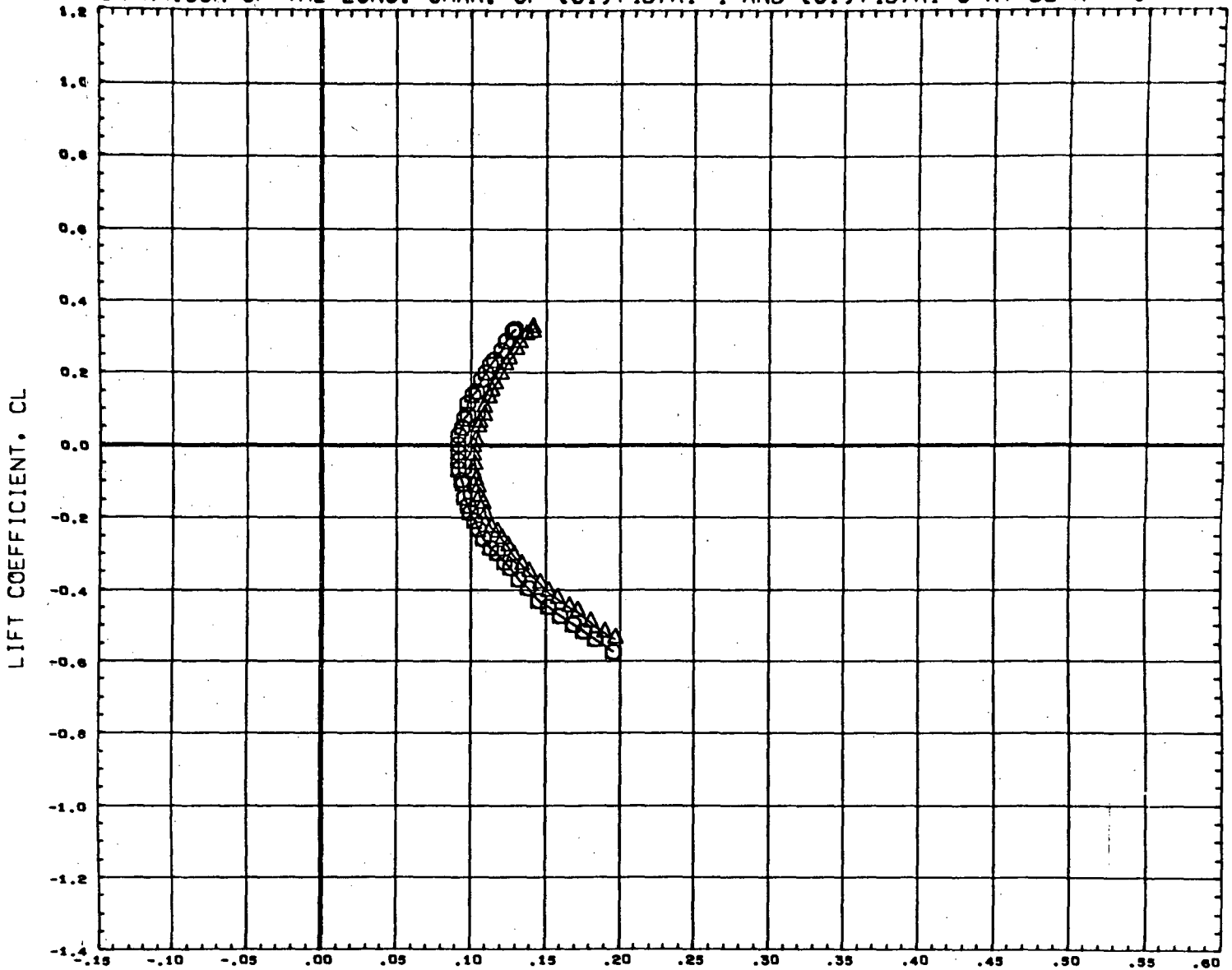
LIFT COEFFICIENT SQUARED, CLSQR

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

PAGE 558

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



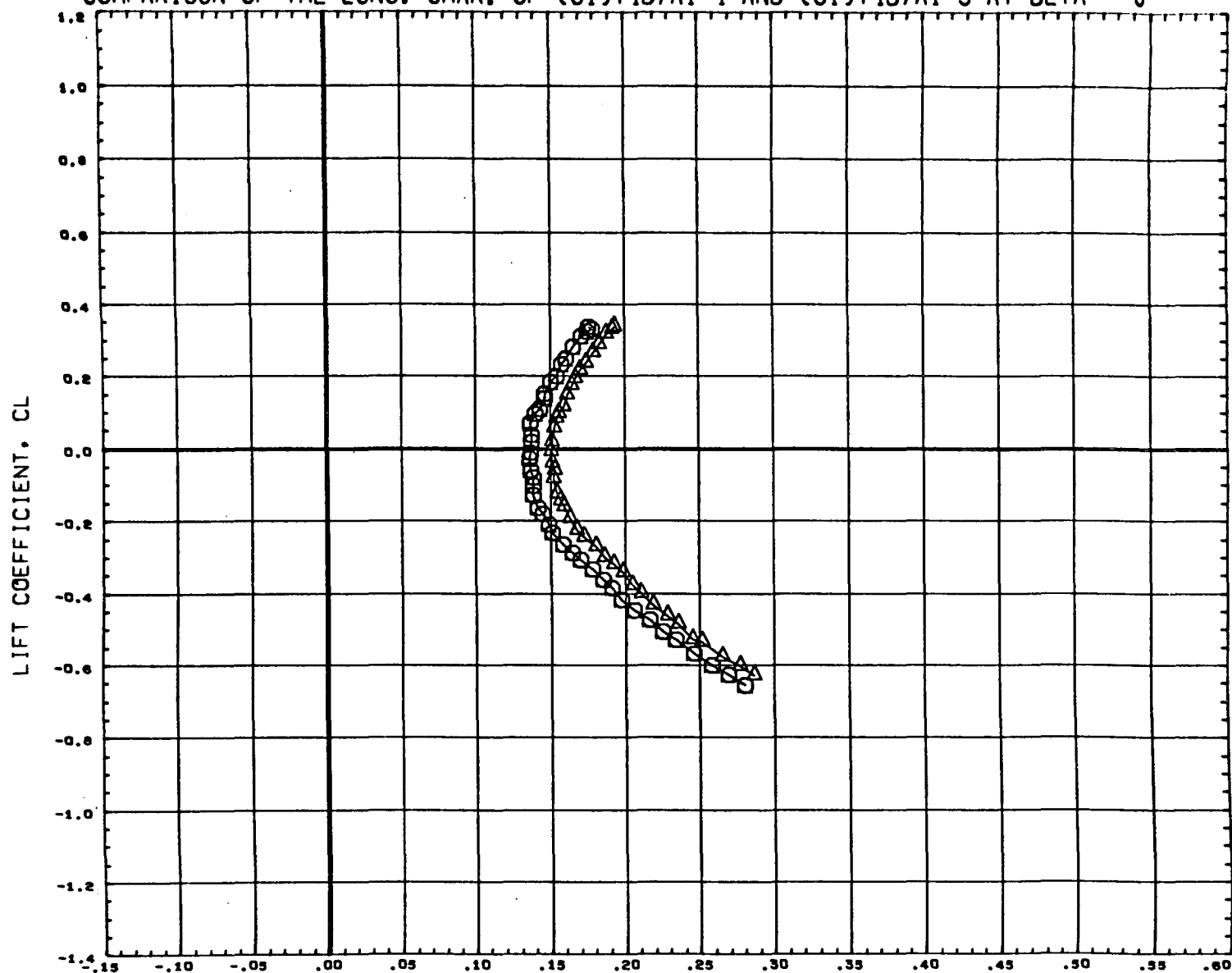
FOREBODY DRAG COEFFICIENT, CDF

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

PAGE 559

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) (01)T4B7A1-4
(CD74E4) (01)T4B7A1-5

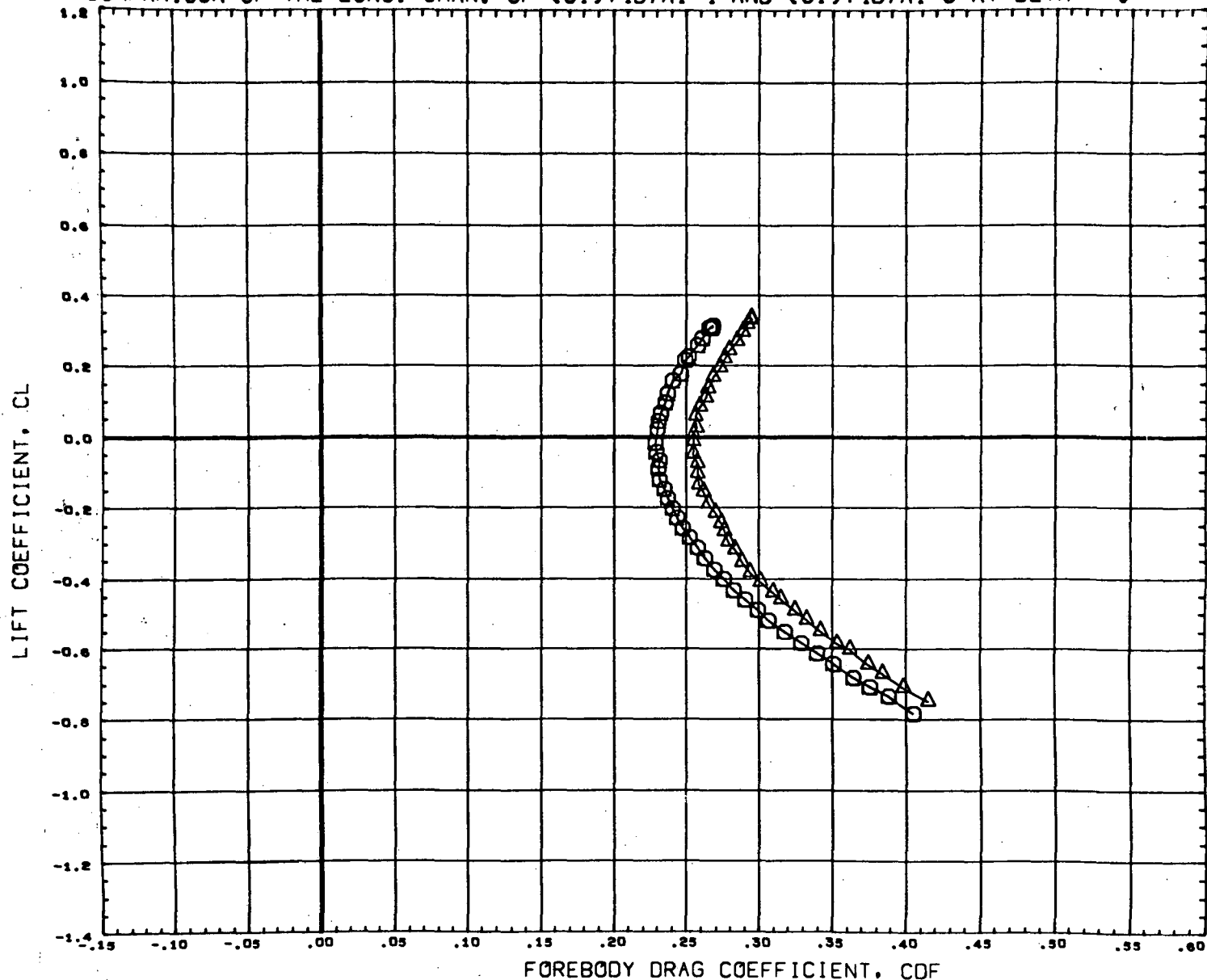
BETA ELEVTR AILRON RUDDER
0.000 0.000 0.000 0.000
0.000 0.000 0.000 0.000

REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 957.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060 SCALE

MACH .90

PAGE 560

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

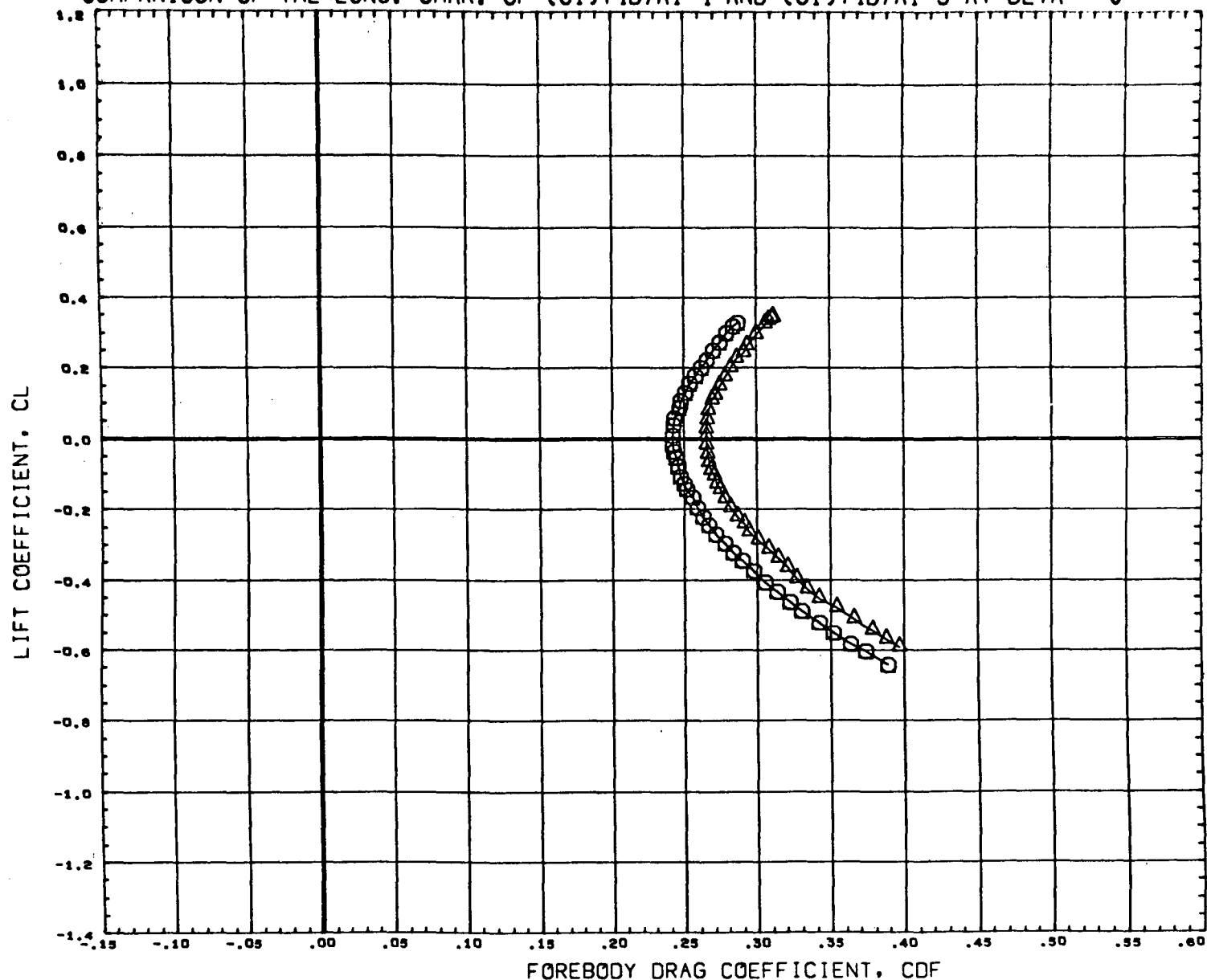


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.3004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 937.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

PAGE 561

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD74C7) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (CD74E4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 |

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

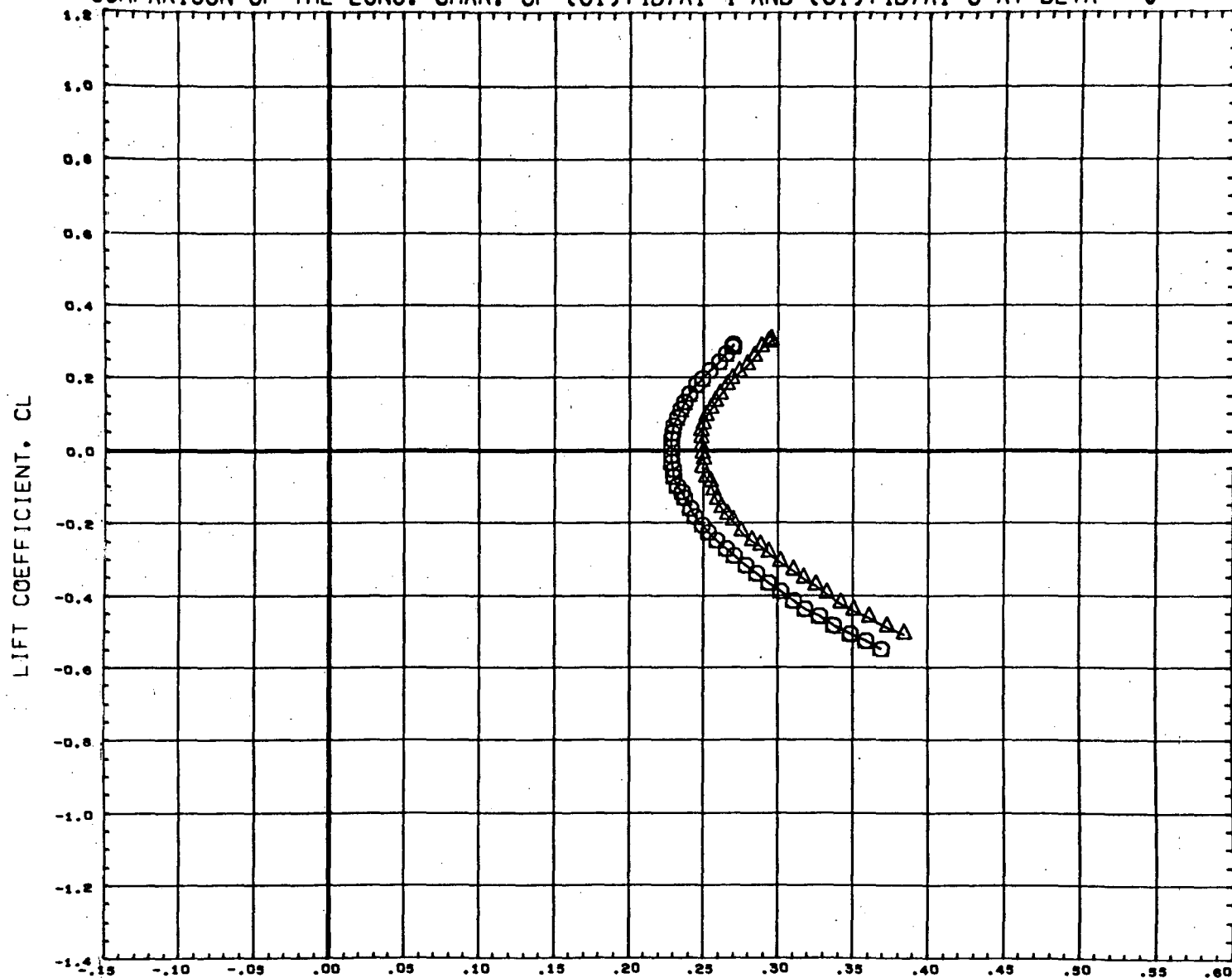
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 892.0004 | IN. |
| XMRP | 957.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH

1.51

PAGE 562

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

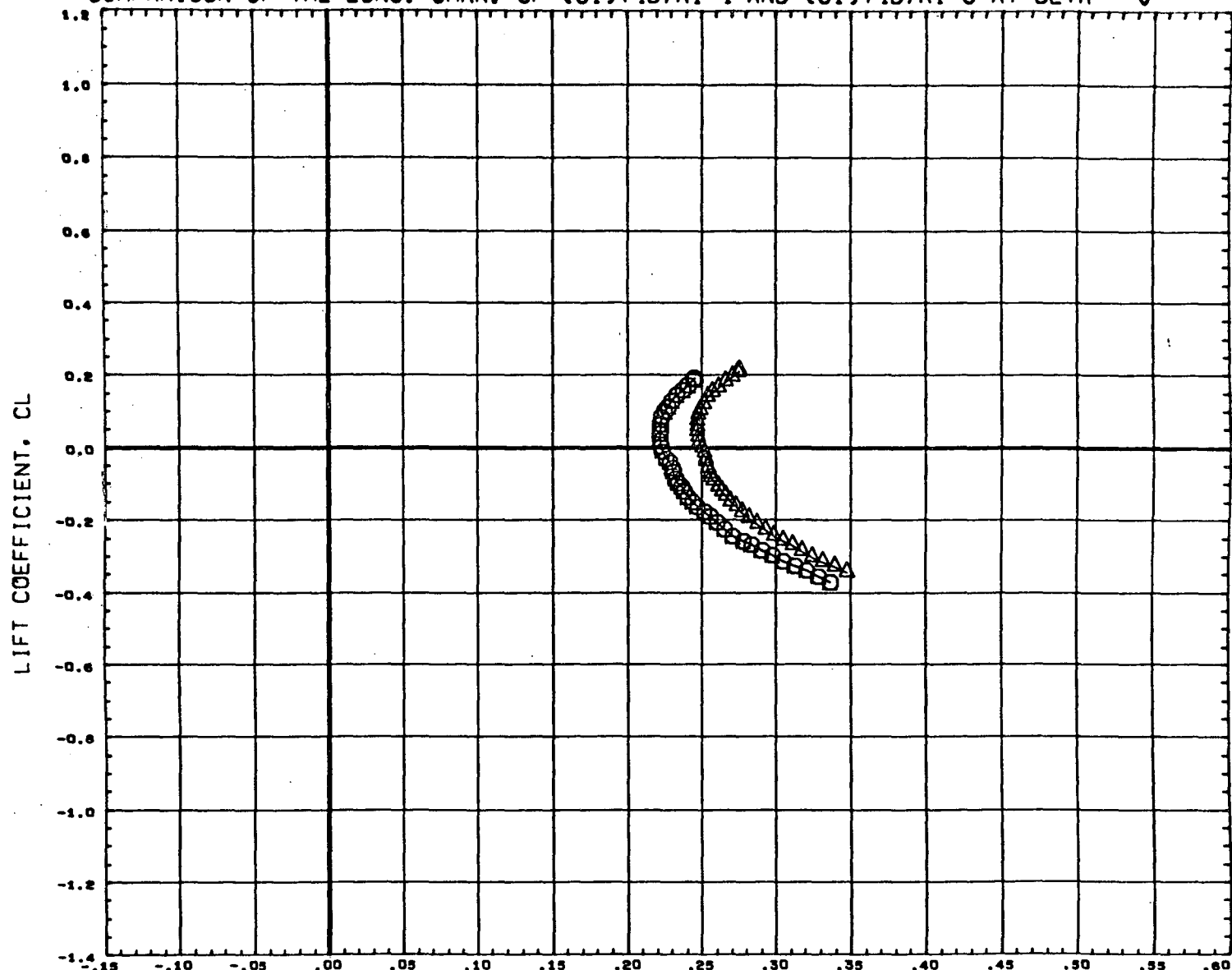


| DATA SET SYMBOL | | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | ○ | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | △ | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | | BREF | 882.0004 IN. |
| | | | | | | | XMRRP | 557.0004 IN. |
| | | | | | | | YMRRP | 0.0000 IN. |
| | | | | | | | ZMRRP | 200.0004 IN. |
| | | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

PAGE 563

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



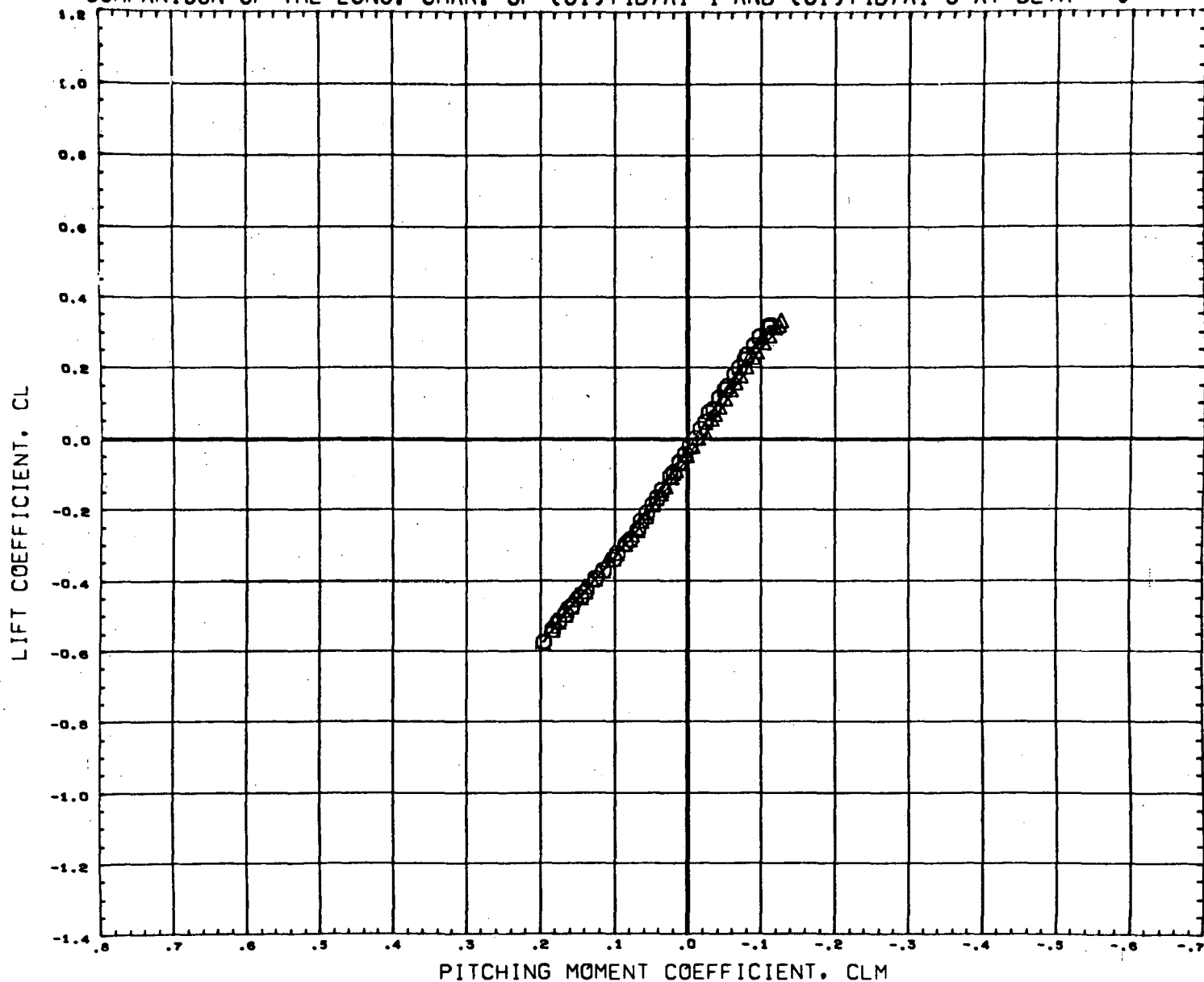
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH



4.47

PAGE 564

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4
(CD74E4)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5

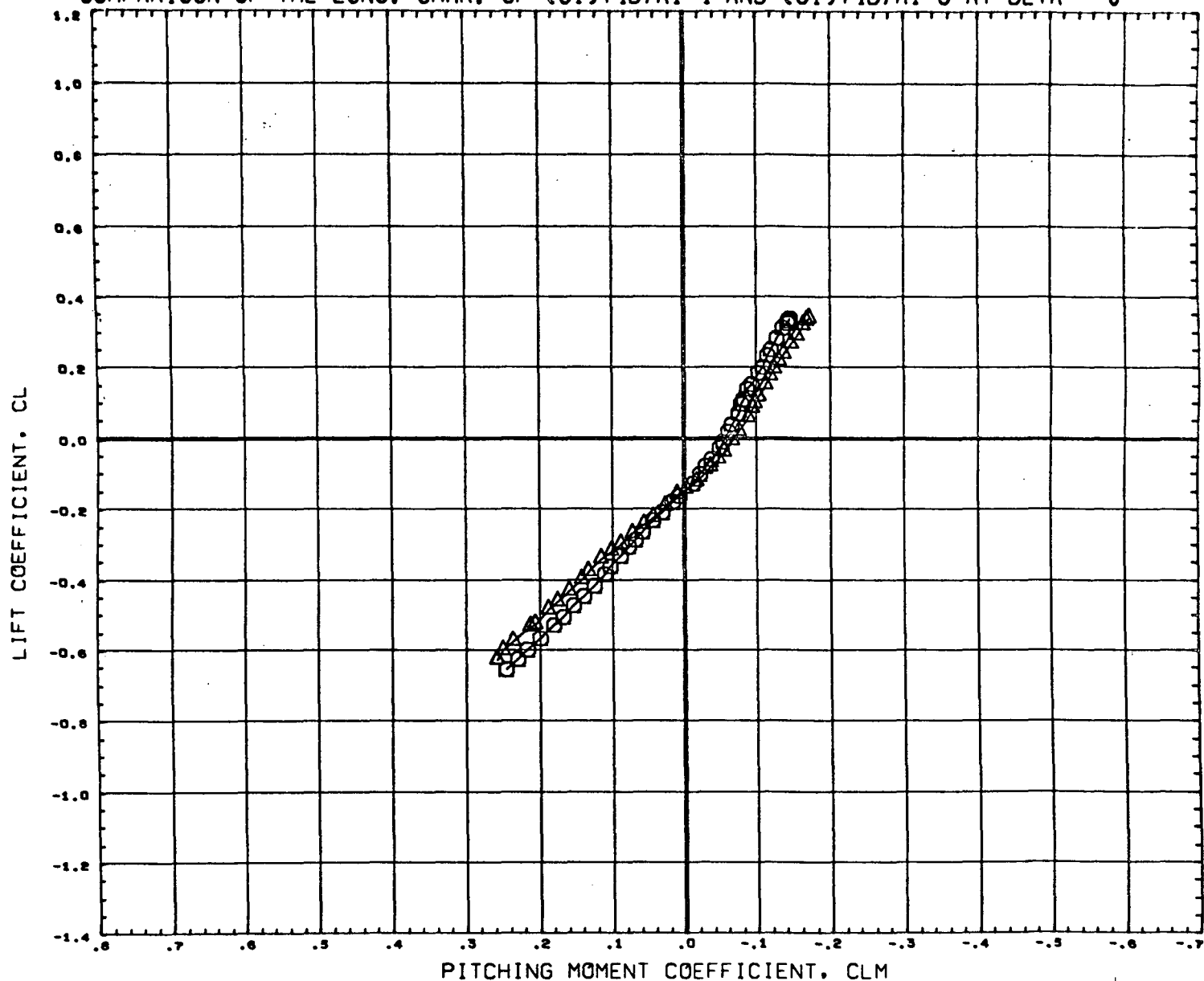
| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 809.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH

.58

PAGE 565

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74E4) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

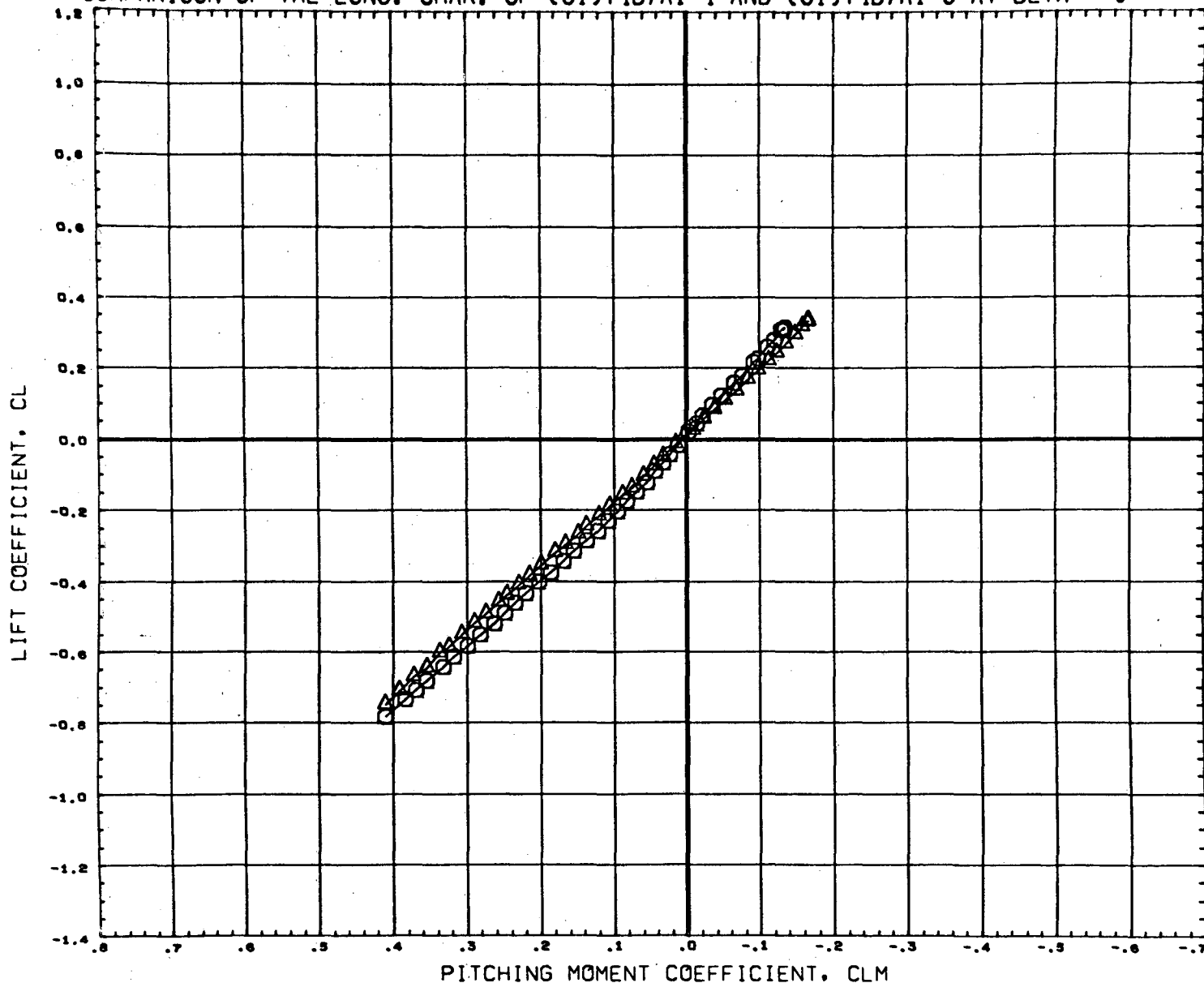
BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 862.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH .90

PAGE 566

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0

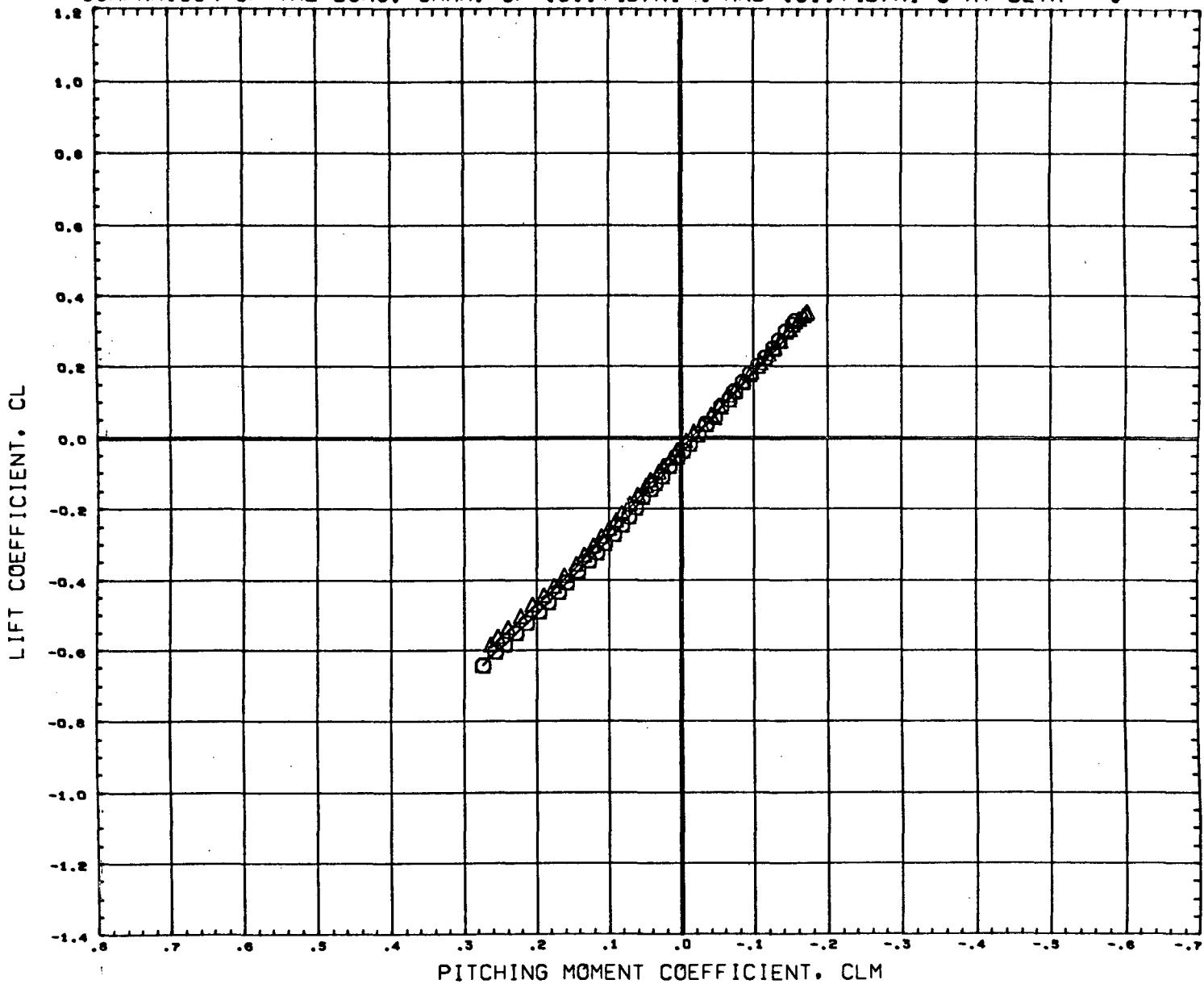


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74C7) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

PAGE 567

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7) \bigcirc MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (CD74E4) \triangle MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

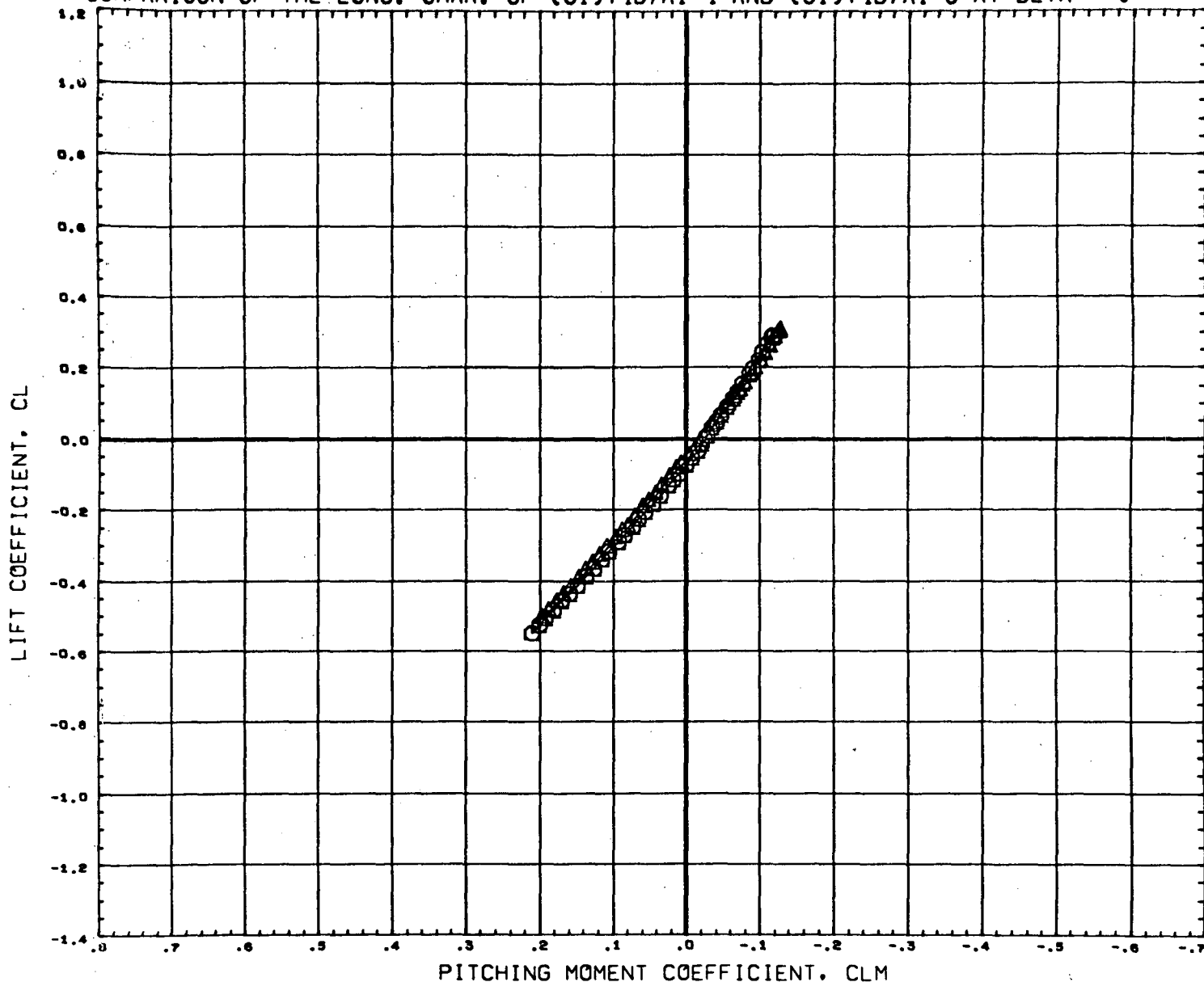
BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 0.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE



MACH 1.51

PAGE 568

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74C7)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
(CD74E4)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

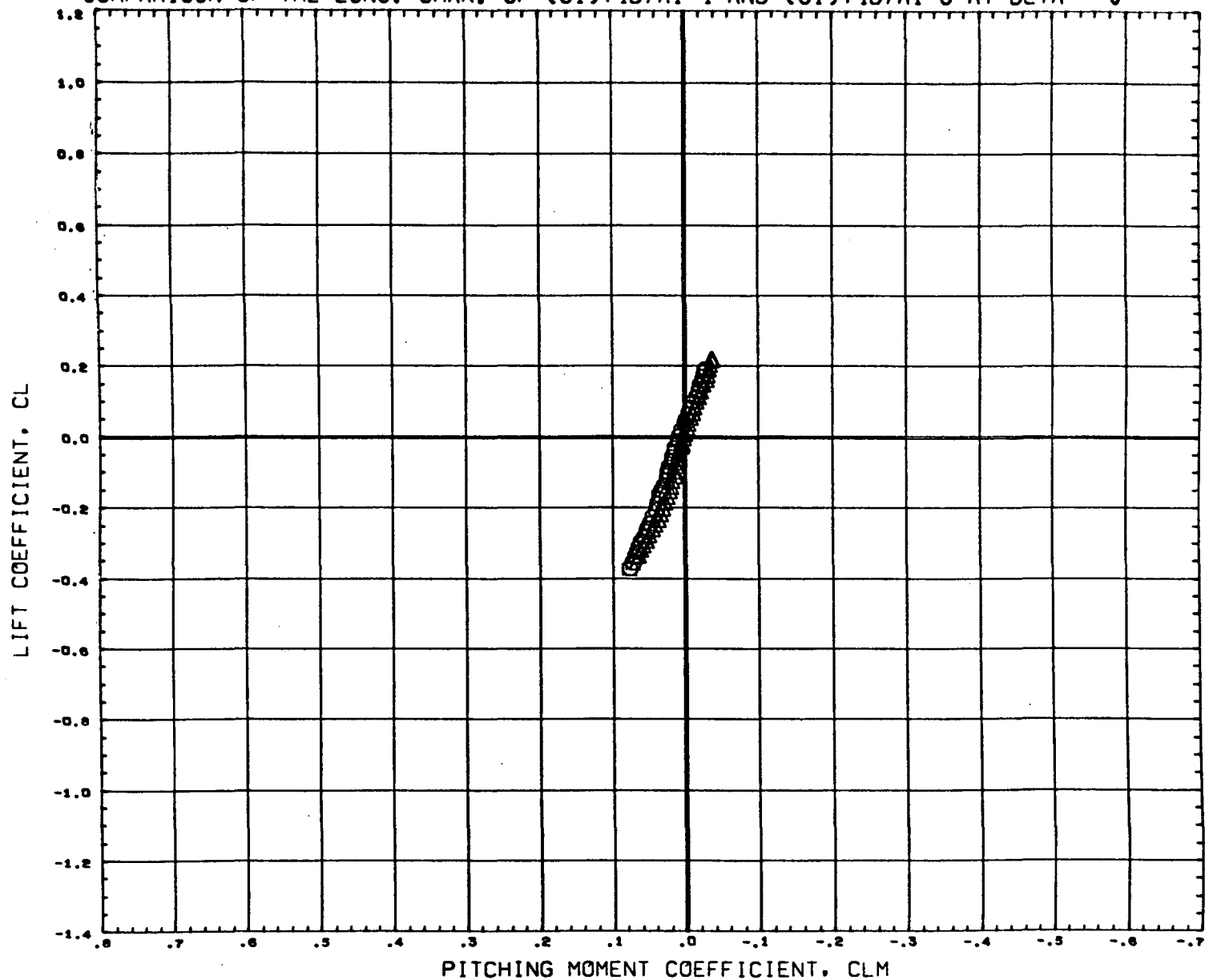
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |


MACH 2.20


PAGE 569

COMPARISON OF THE LONG. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(C074C7)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4

(C074E4)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

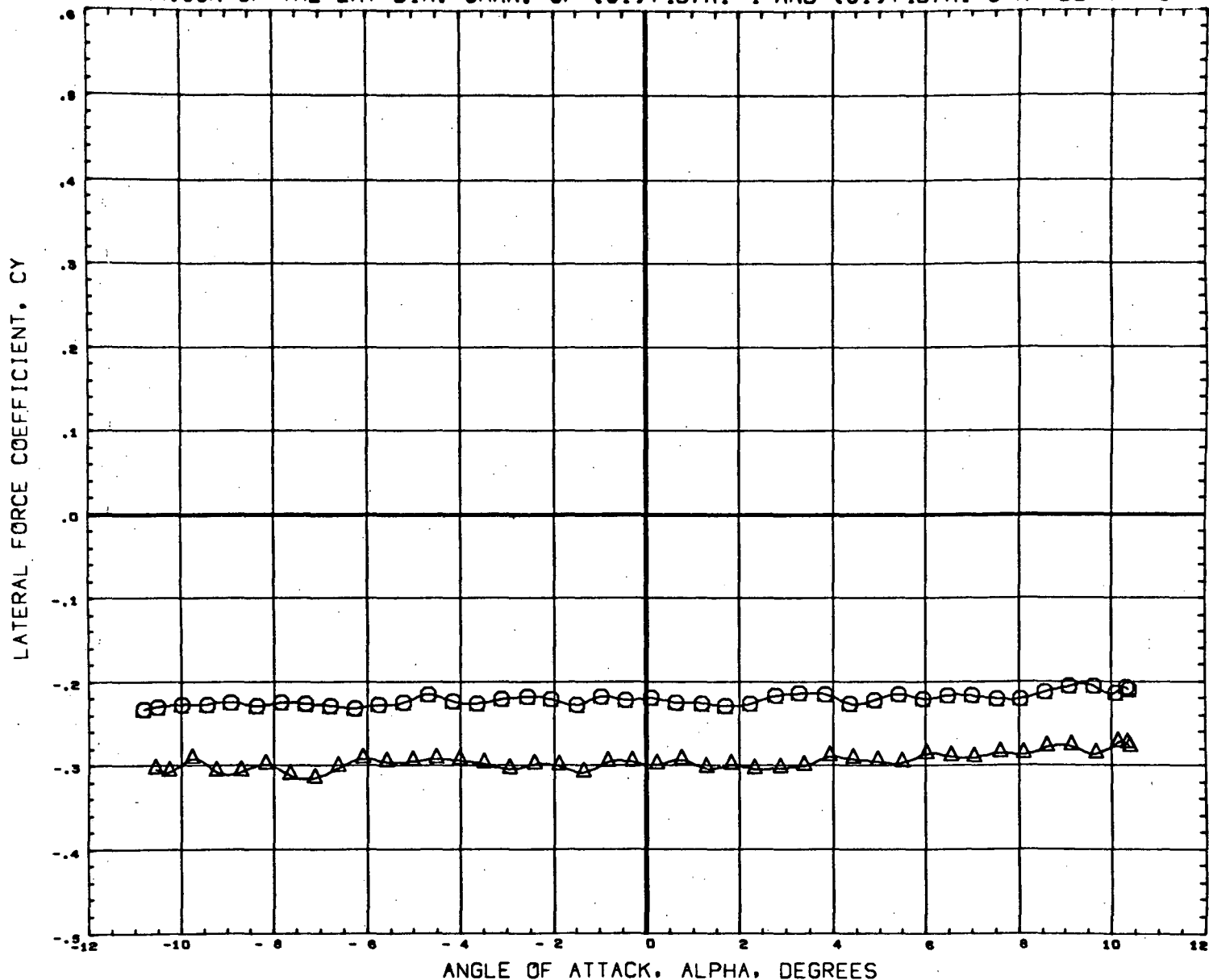
| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH

4.47

PAGE 570

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 6



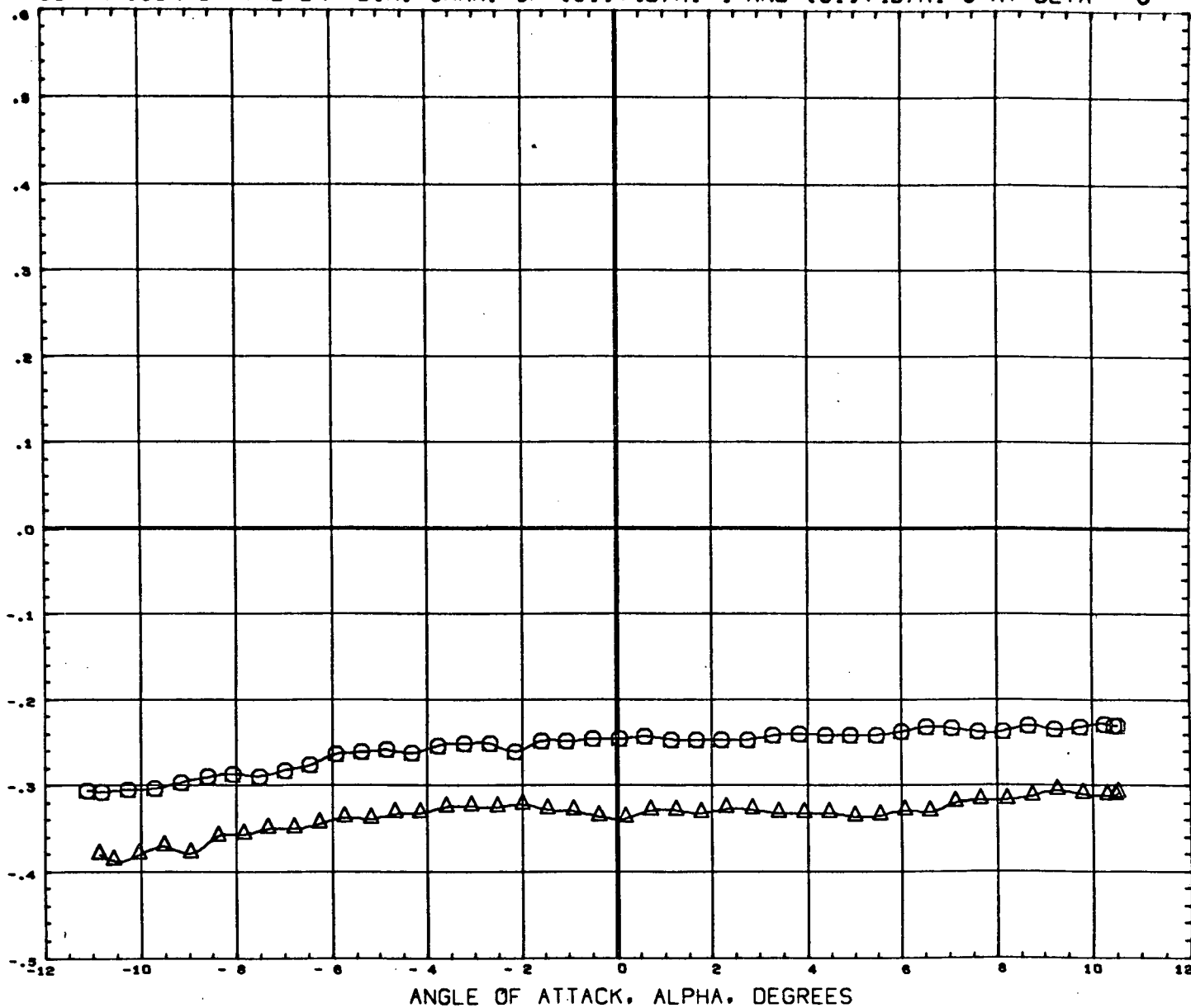
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (TD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

PAGE 571

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 6

LATERAL FORCE COEFFICIENT, CY



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(RD74C9) (01)T4B7A1-4
(TD74E6) (01)T4B7A1-5

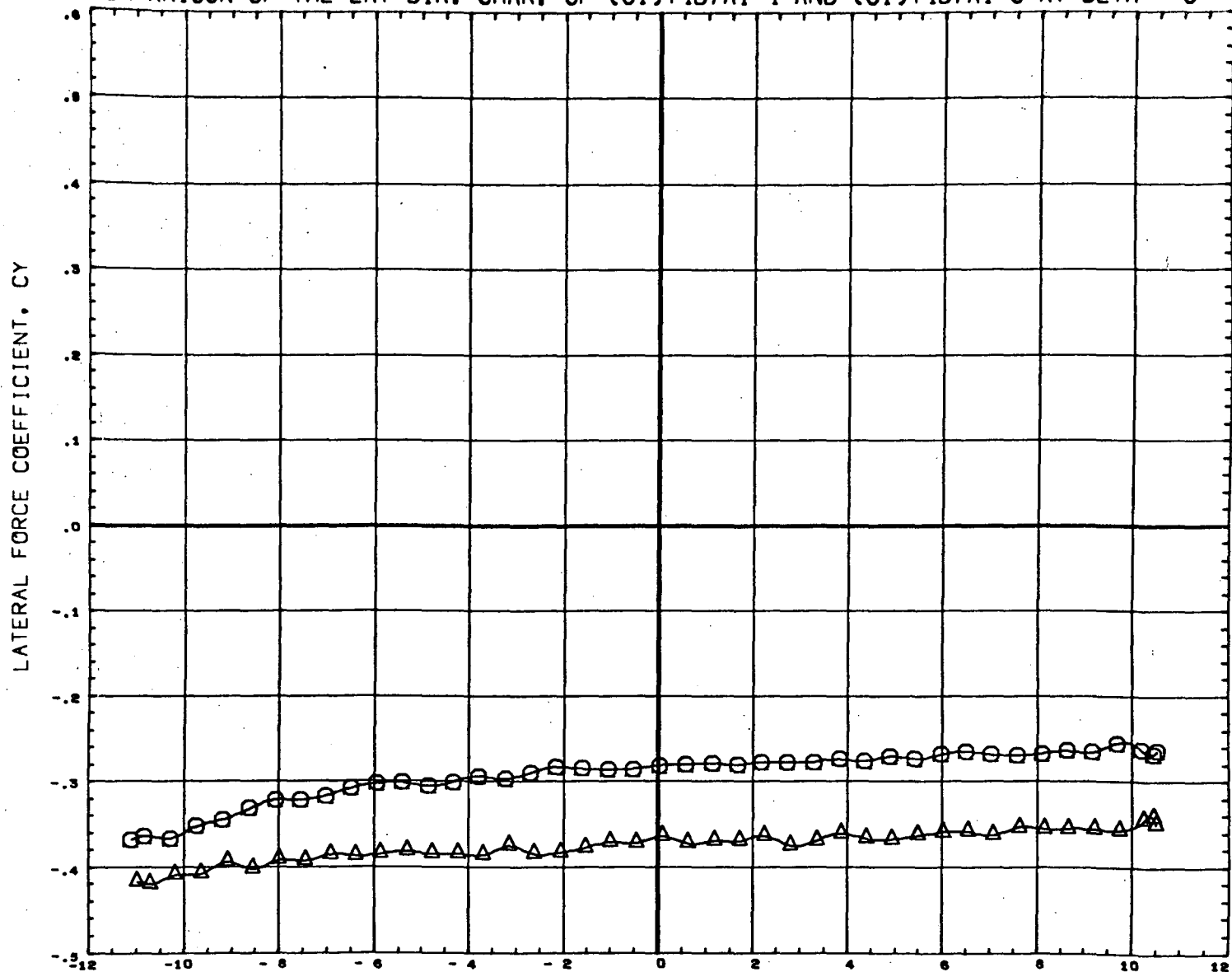
BETA ELEVTR AILRON RUDDER
6.000 0.000 0.000 0.000
6.000 0.000 0.000 0.000

REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060 SCALE

MACH .90

PAGE 572

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 6



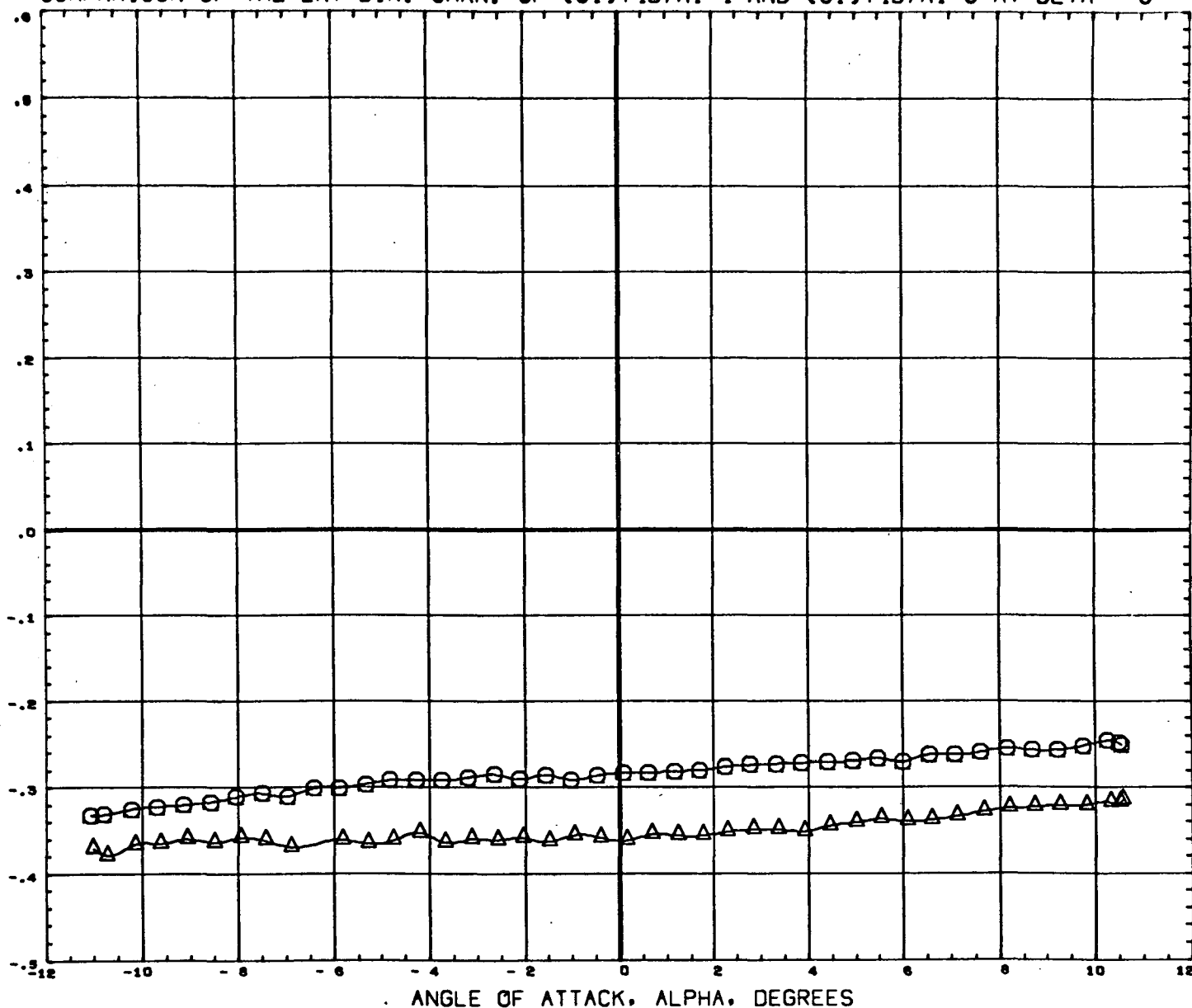
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (TD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.10

PAGE 573

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 6

LATERAL FORCE COEFFICIENT, CY



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(RD74C9) (01)T4B7A1-4
(TD74E6) (01)T4B7A1-5

BETA ELEVTR AILRON RUDDER
6.000 0.000 0.000 0.000
6.000 0.000 0.000 0.000

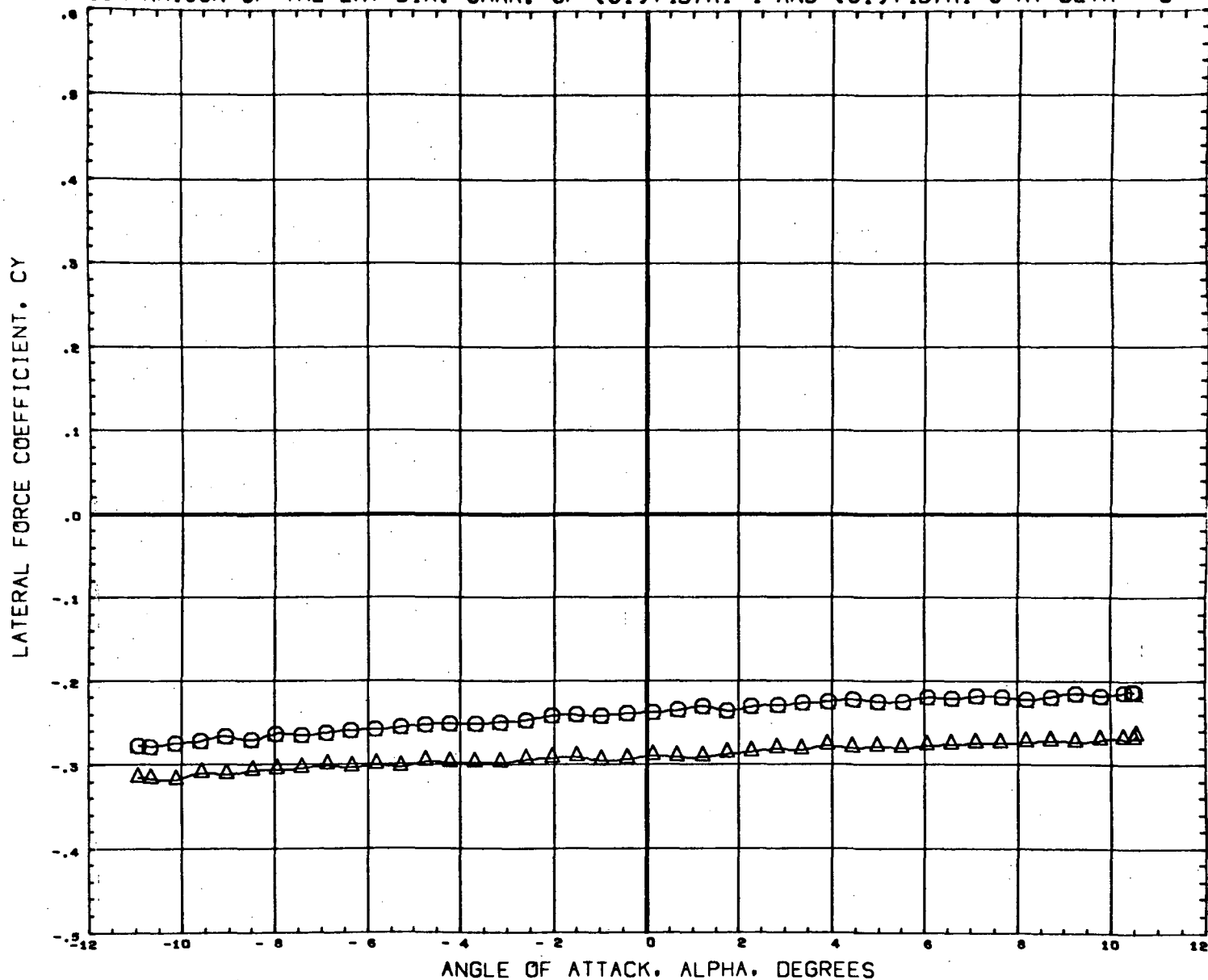
REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 892.0004 IN.
XMRP 957.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060 SCALE

MACH

1.51

PAGE 574

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 6



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (RD74C9) (0) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (TD74E6) (1) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

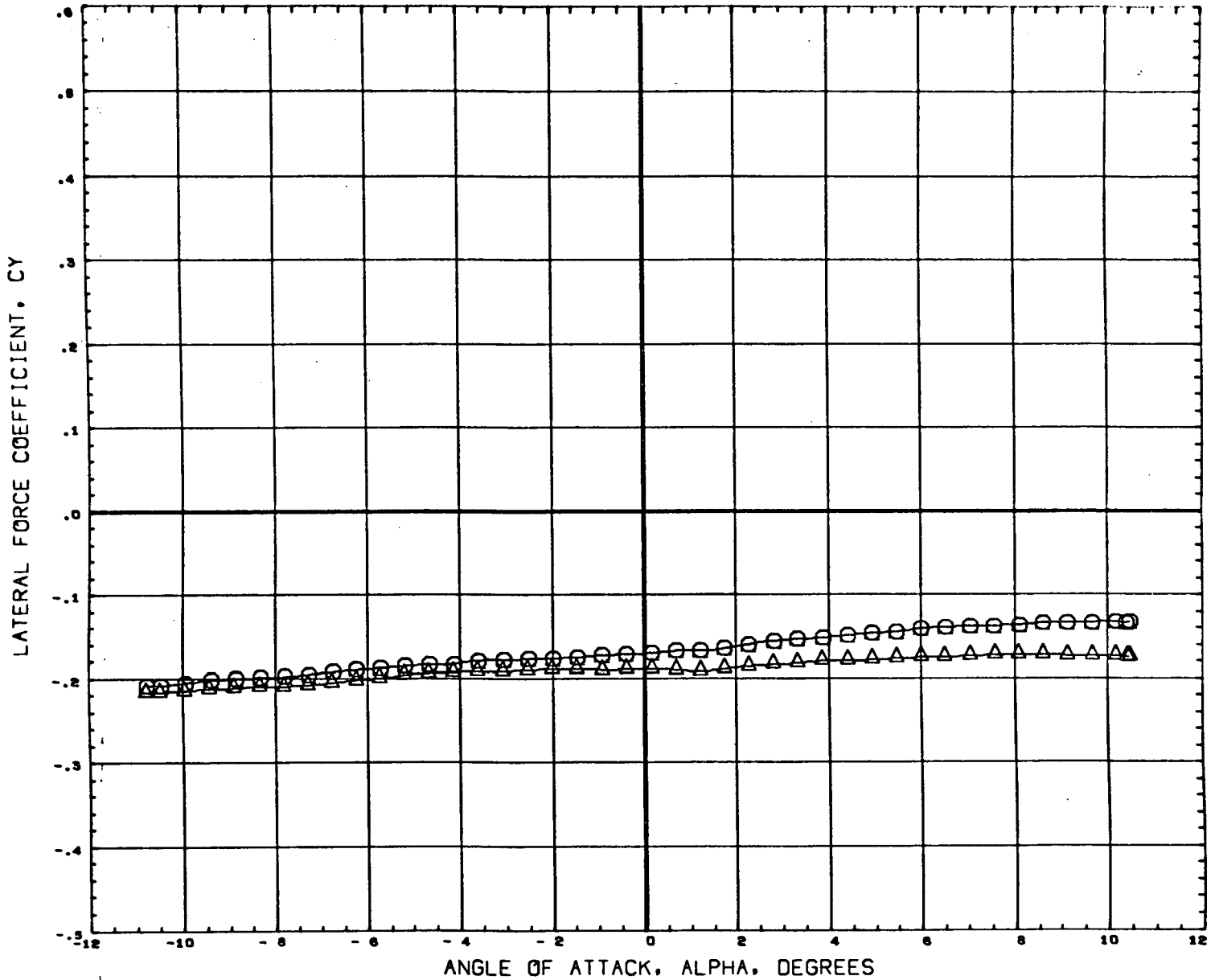
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 6.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | |
|-----------------------|------------------|
| SREF | 3155.3040 SQ.FT. |
| LREF | 609.5004 IN. |
| BREF | 882.0004 IN. |
| XMRP | 557.0004 IN. |
| YMRP | 0.0000 IN. |
| ZMRP | 200.0004 IN. |
| SCALE | 0.0060 SCALE |

MACH 2.20

PAGE 575

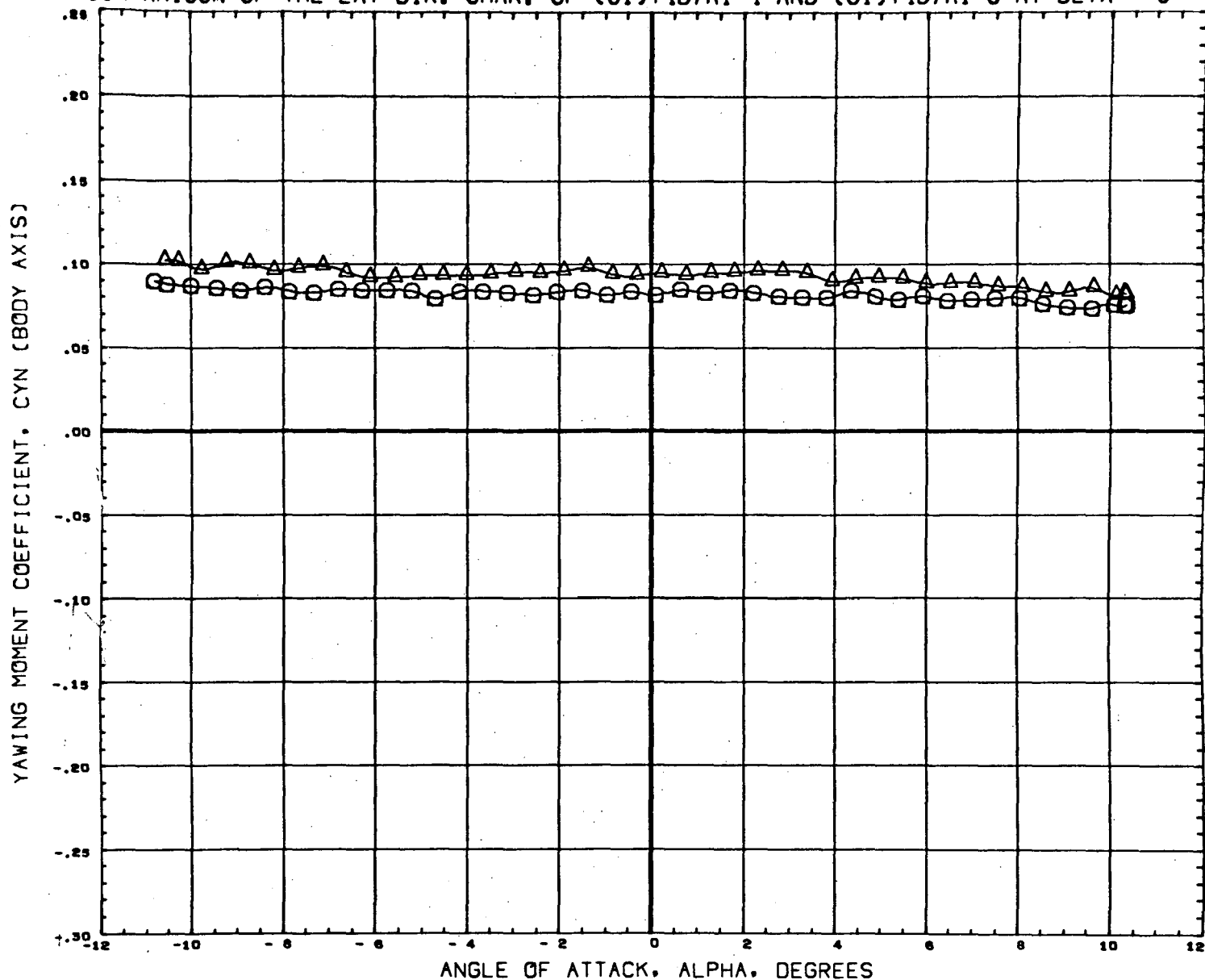
COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 6



| DATA SET | SYMBOL | CONFIGURATION DESCRIPTION |
|----------|--------|---|
| (RD74C9) | ○ | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (TD74E6) | △ | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.9004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 6



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(RD74C9) (01)T4B7A1-4
(TD74E6) (01)T4B7A1-5

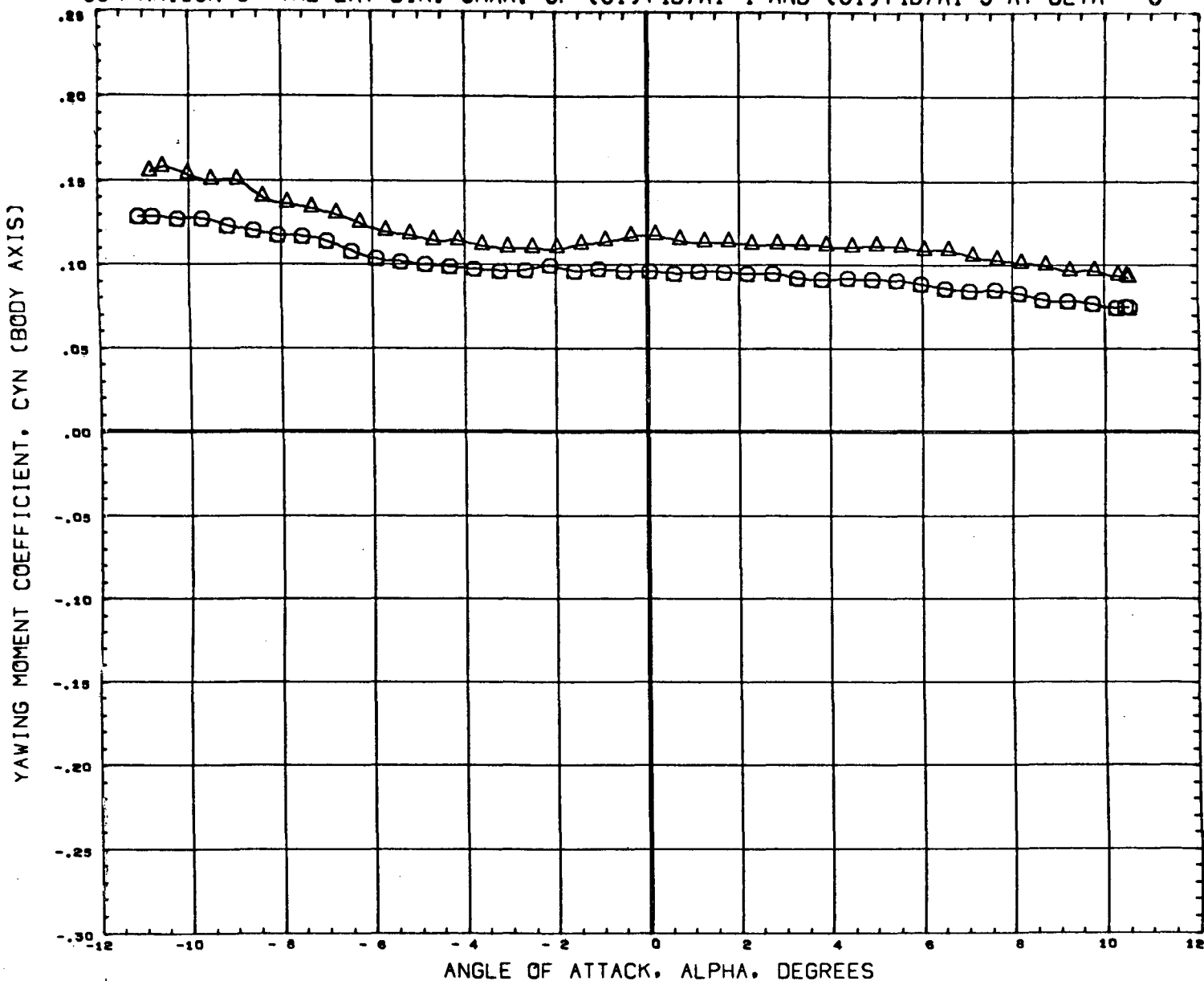
BETA ELEVTR AILRON RUDDER
6.000 0.000 0.000 0.000
6.000 0.000 0.000 0.000

REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060 SCALE

MACH .58

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COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 6



DATA SET SYMBOL - CONFIGURATION DESCRIPTION

(RD74C9) (01)T4B7A1-4
(TD74E6) (01)T4B7A1-5

BETA 6.000
ELEVTR 0.000
AILRON 0.000
RUDDER 0.000

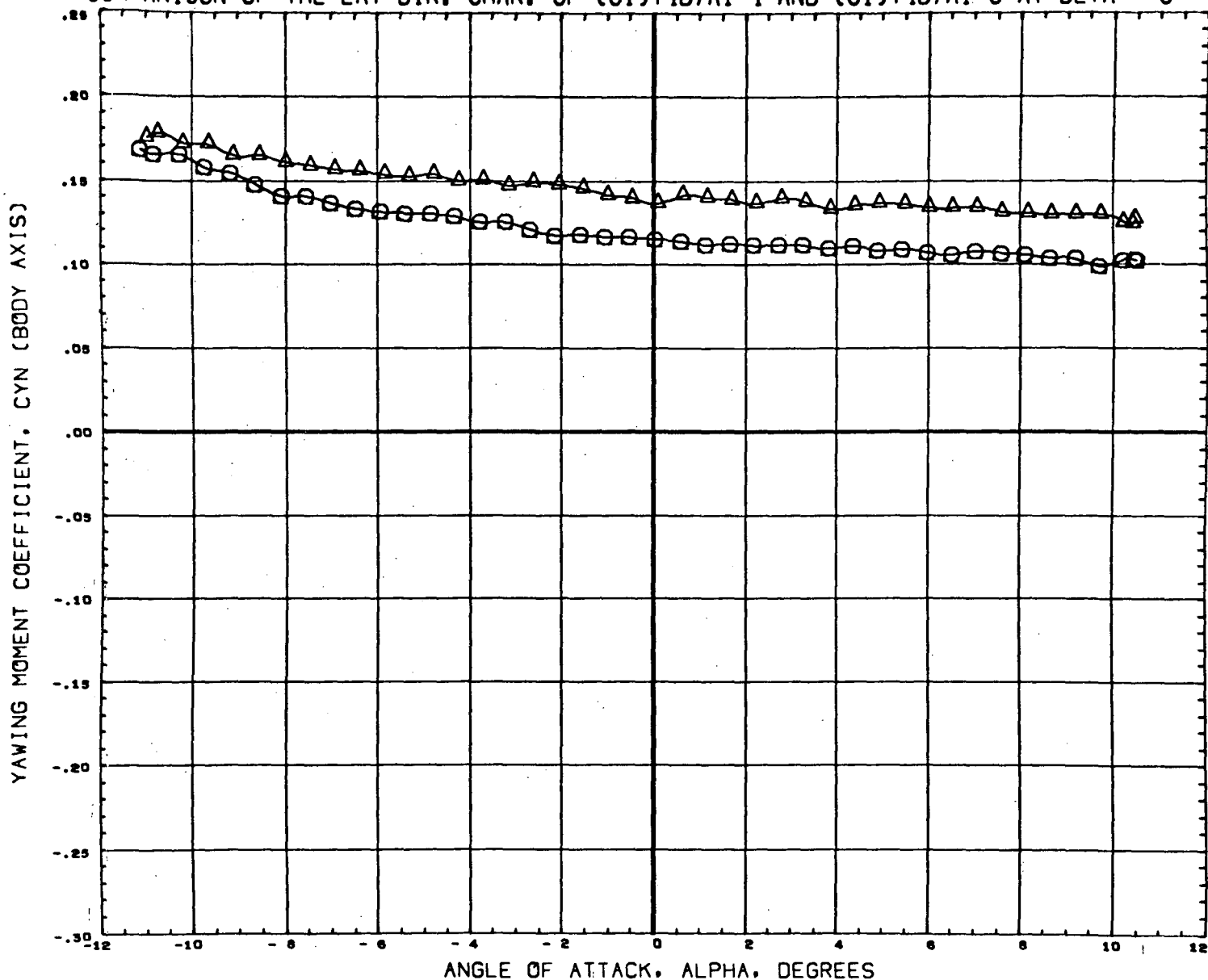
REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.3004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060 SCALE

MACH

.90

PAGE 578

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 6



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(RD74C9) (01)T4B7A1-4
(TD74E6) (01)T4B7A1-5

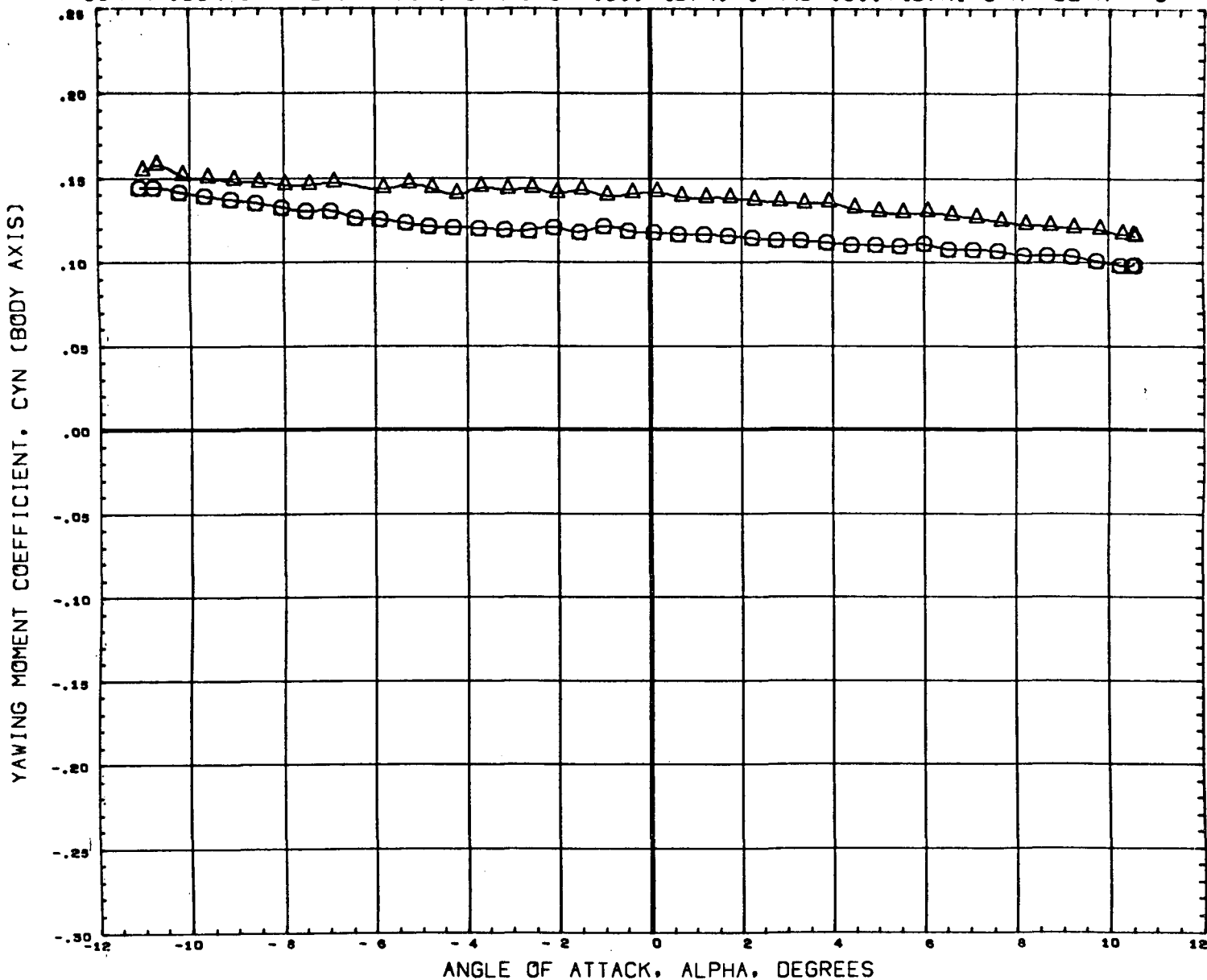
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 6.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|---------|
| SREF | 3155.3040 | SQ. FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMHP | 557.0004 | IN. |
| YMHP | 0.0000 | IN. |
| ZMHP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 1.10

PAGE 579

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 6

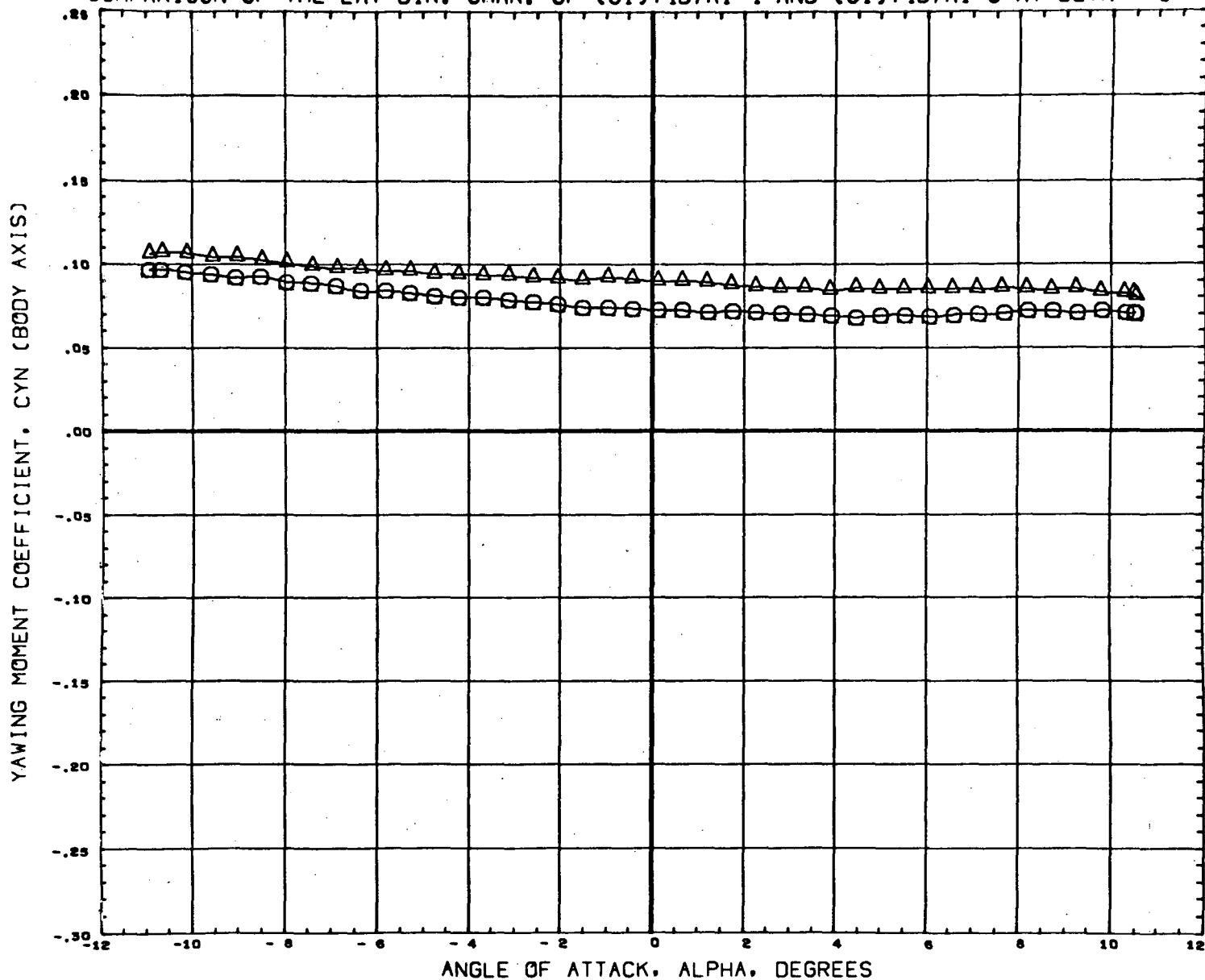


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (TD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.51

PAGE 580

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 6



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(RD74C9) (0) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
(TD74E6) (1) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

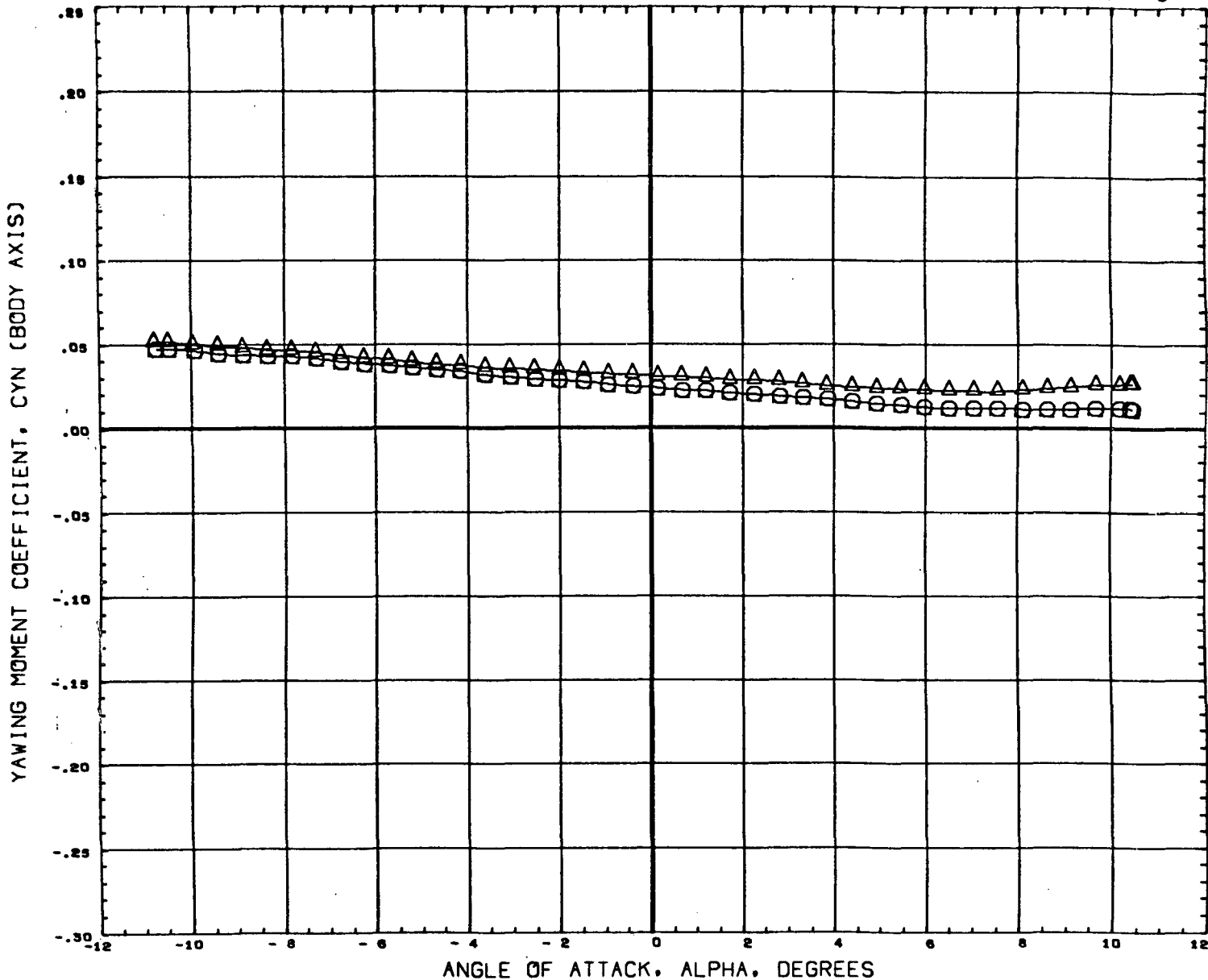
BETA ELEVTR AILRON RUDDER
6.000 0.000 0.000 0.000
6.000 0.000 0.000 0.000

REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060 SCALE

MACH 2.20

PAGE 581

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 6

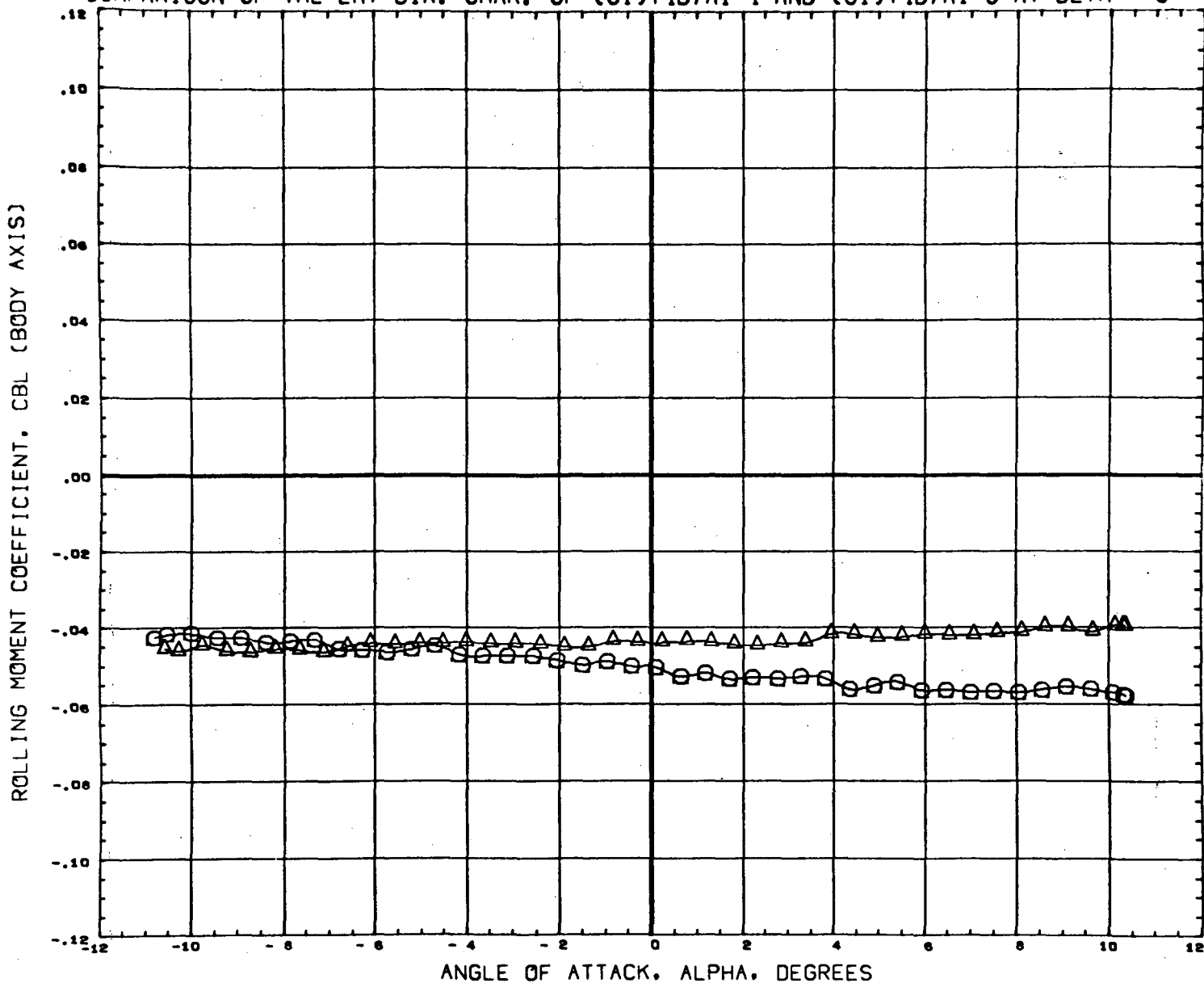


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.5040 SQ.FT. |
| (TD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

PAGE 582

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 6



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (R074C9) ○ | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (T074E6) △ | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 |

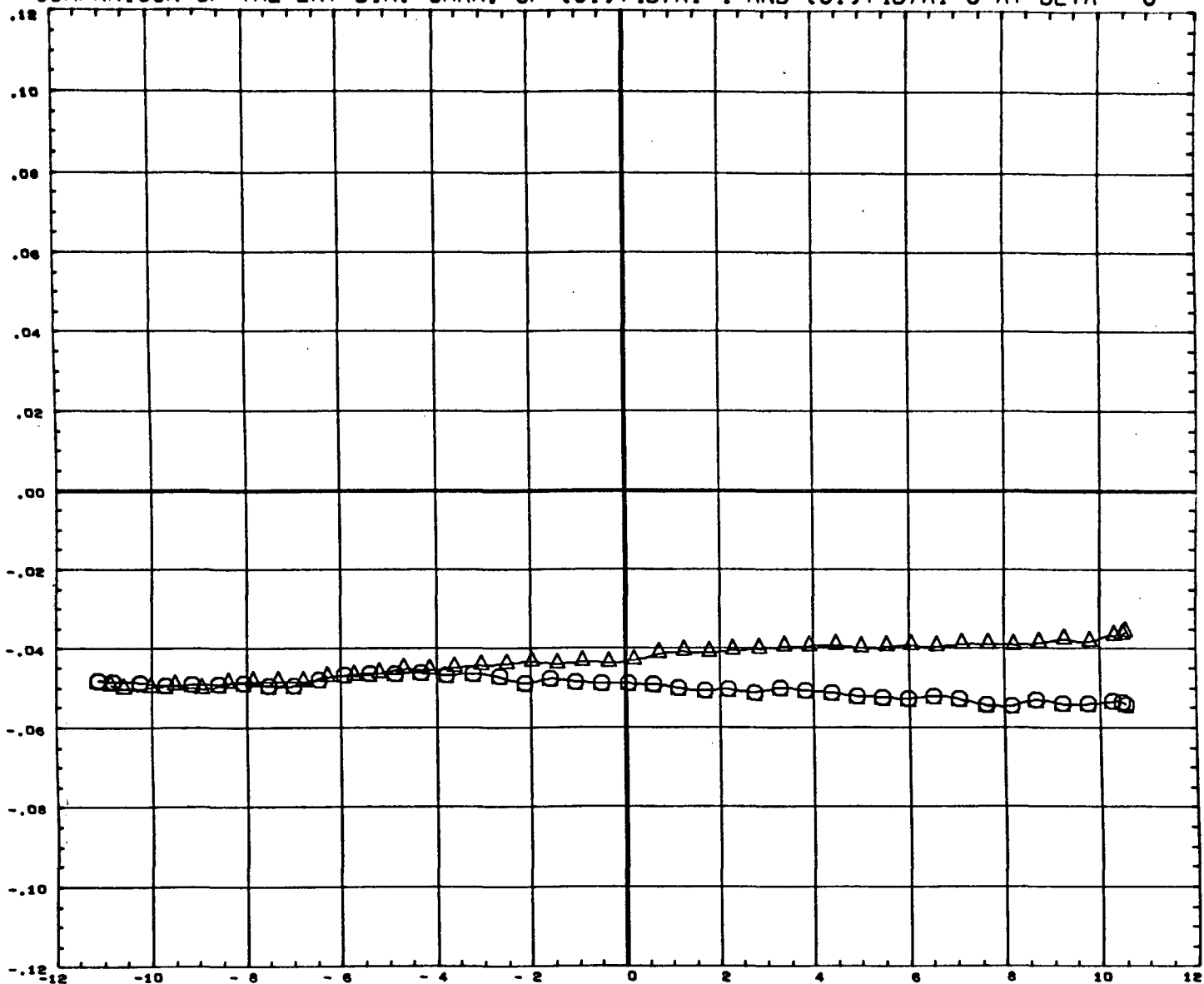
| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 6.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 662.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH .58

PAGE 583

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 6

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



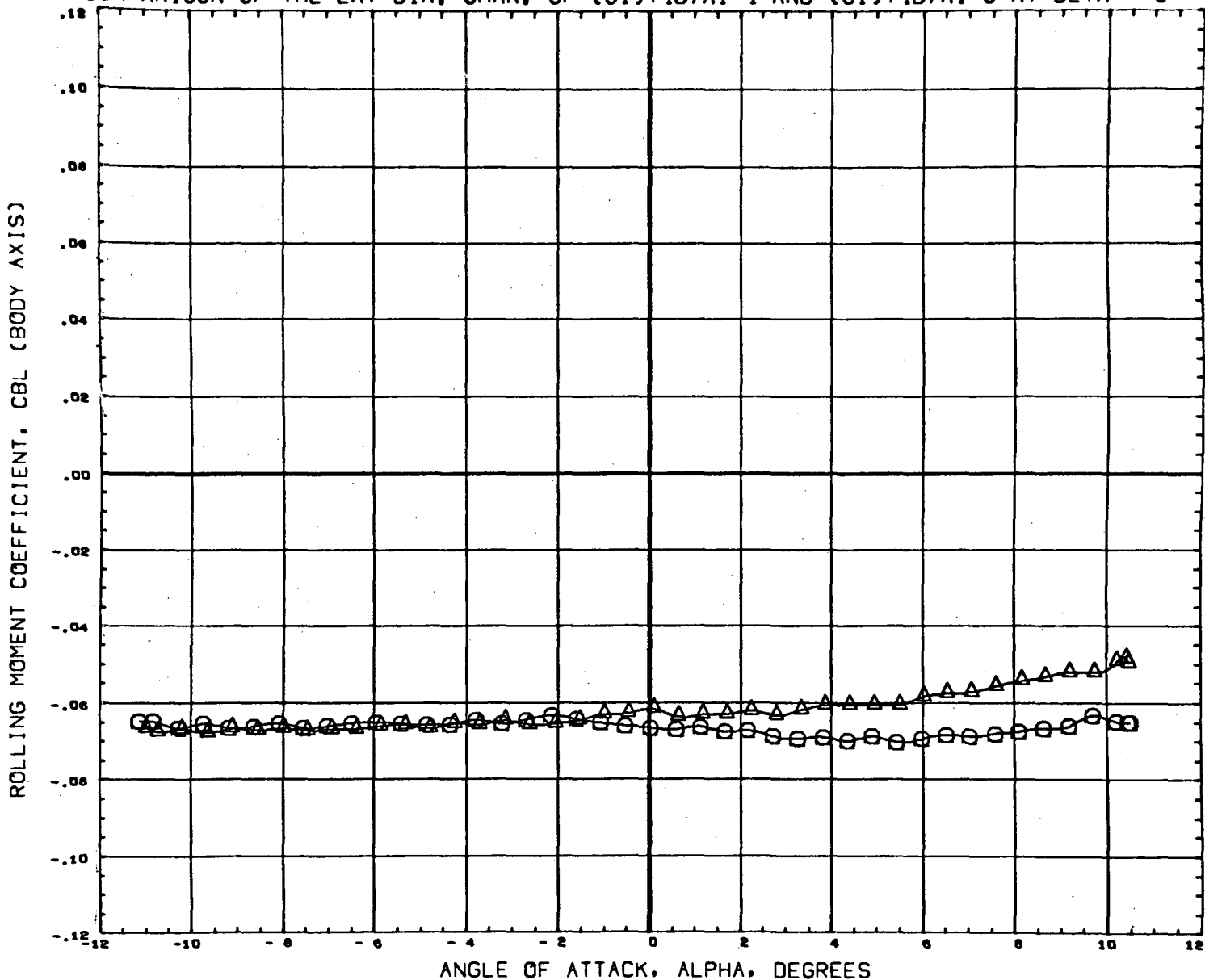
ANGLE OF ATTACK, ALPHA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (TD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

PAGE 584

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 6



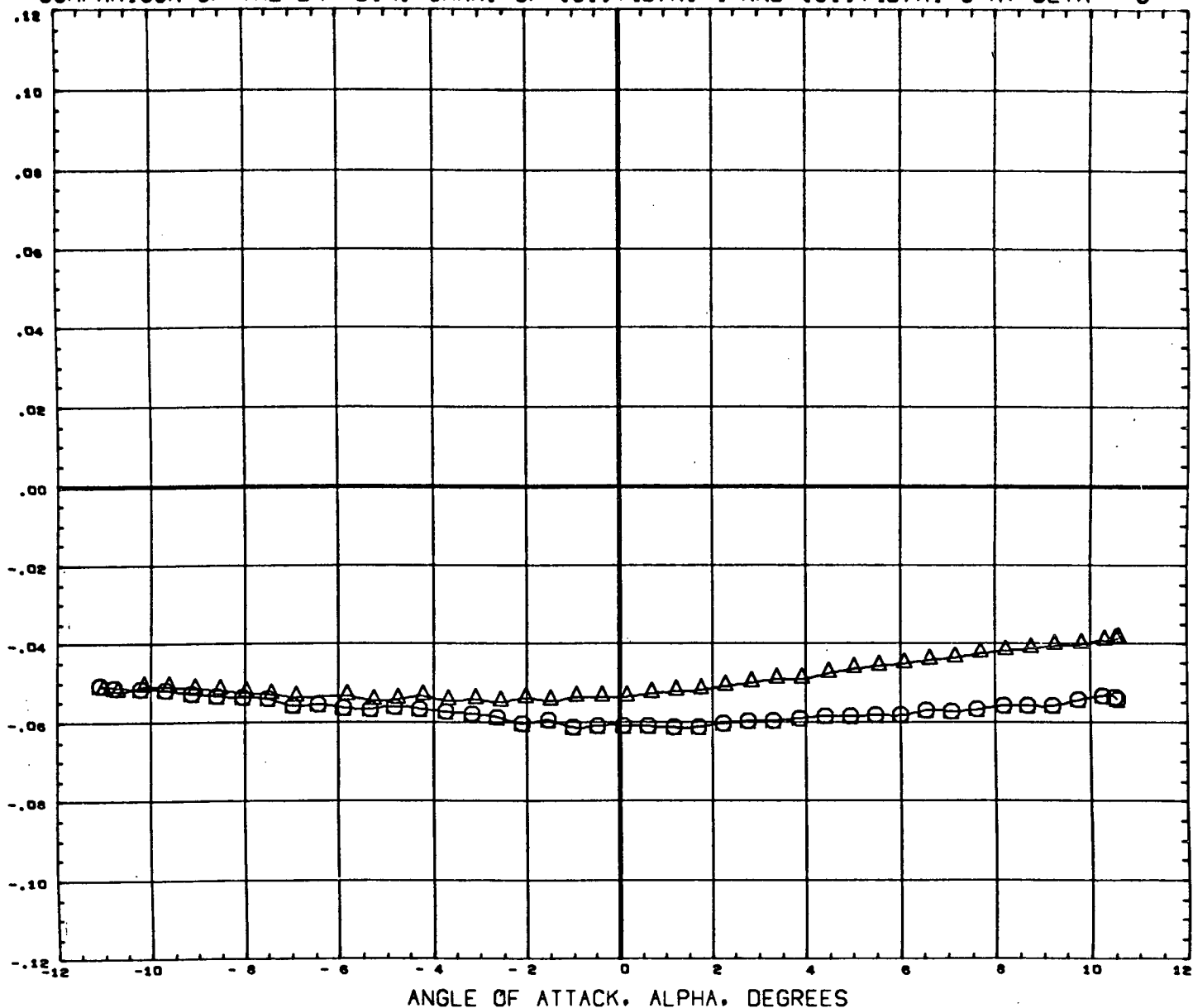
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (TD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 692.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.10

PAGE 585

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 6

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



| DATA SET | SYMBOL | CONFIGURATION DESCRIPTION |
|----------|--------|--|
| (RD74C9) | ○ | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 |
| (TD74E6) | △ | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

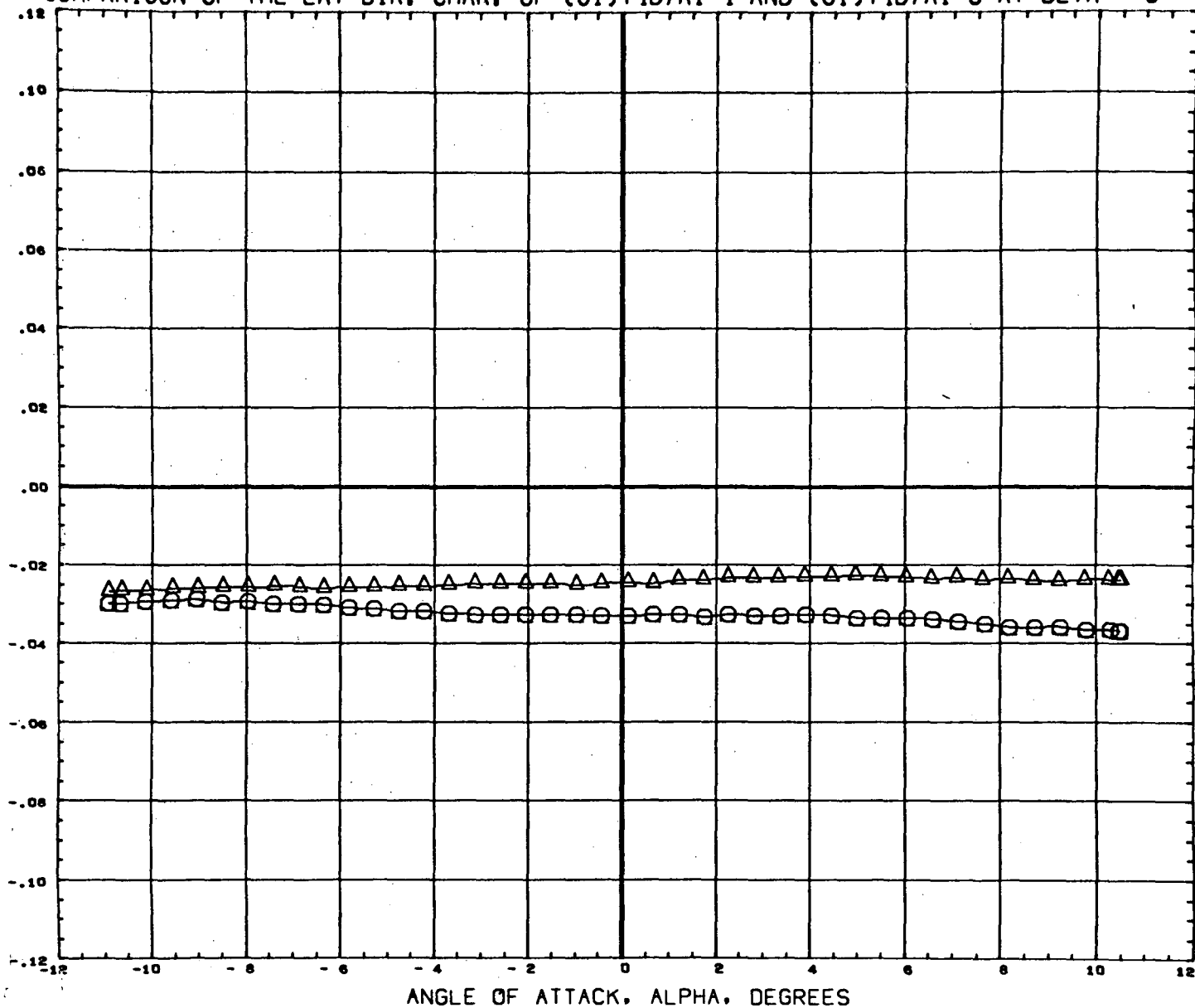
MACH

1.51

PAGE 586

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 6

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (RD74C9) (01)T4B7A1-4
 (TD74E6) (01)T4B7A1-5

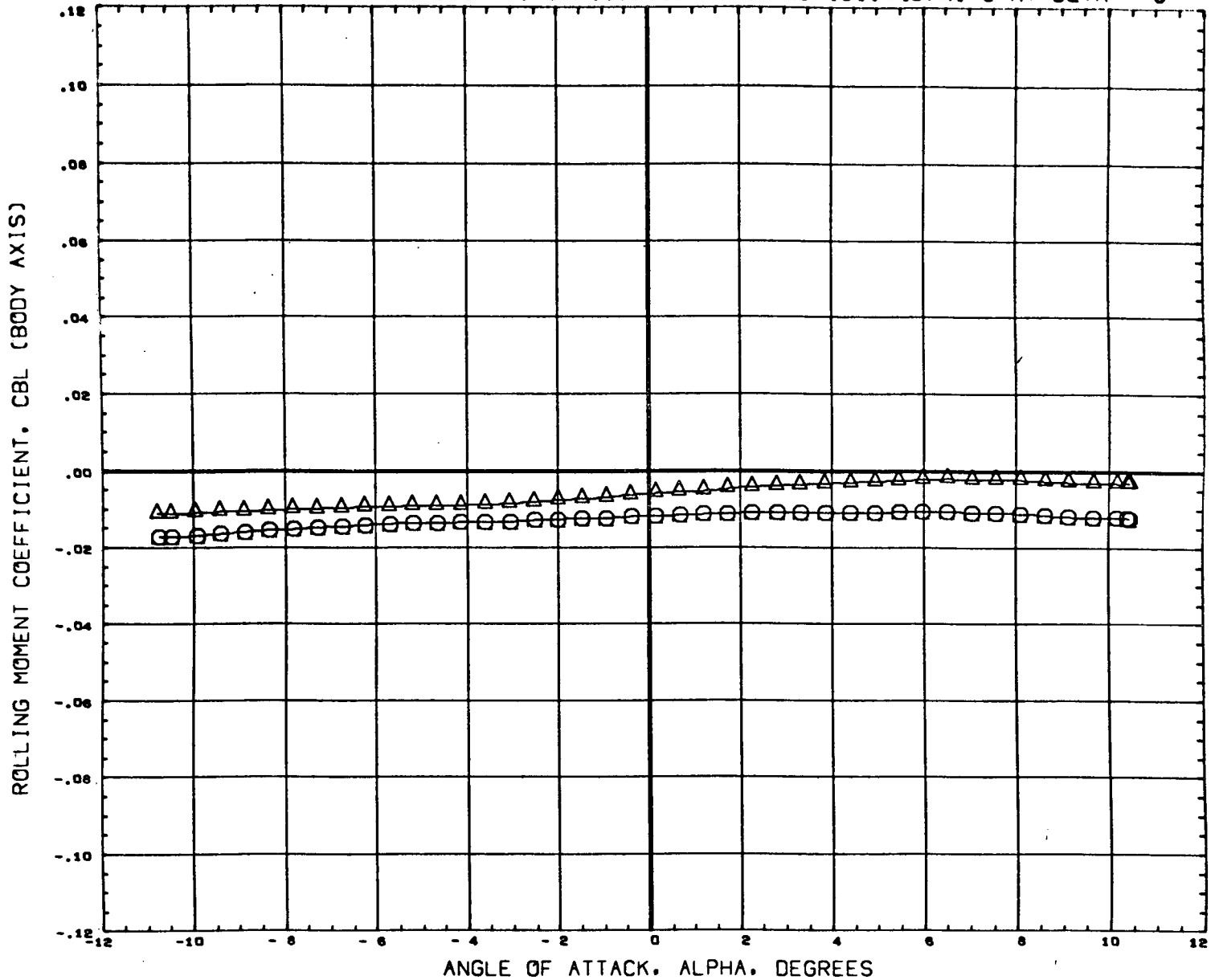
BETA ELEVTR AILRON RUDDER
 6.000 0.000 0.000 0.000
 6.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0080 SCALE

MACH 2.20

PAGE 587

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT BETA = 6

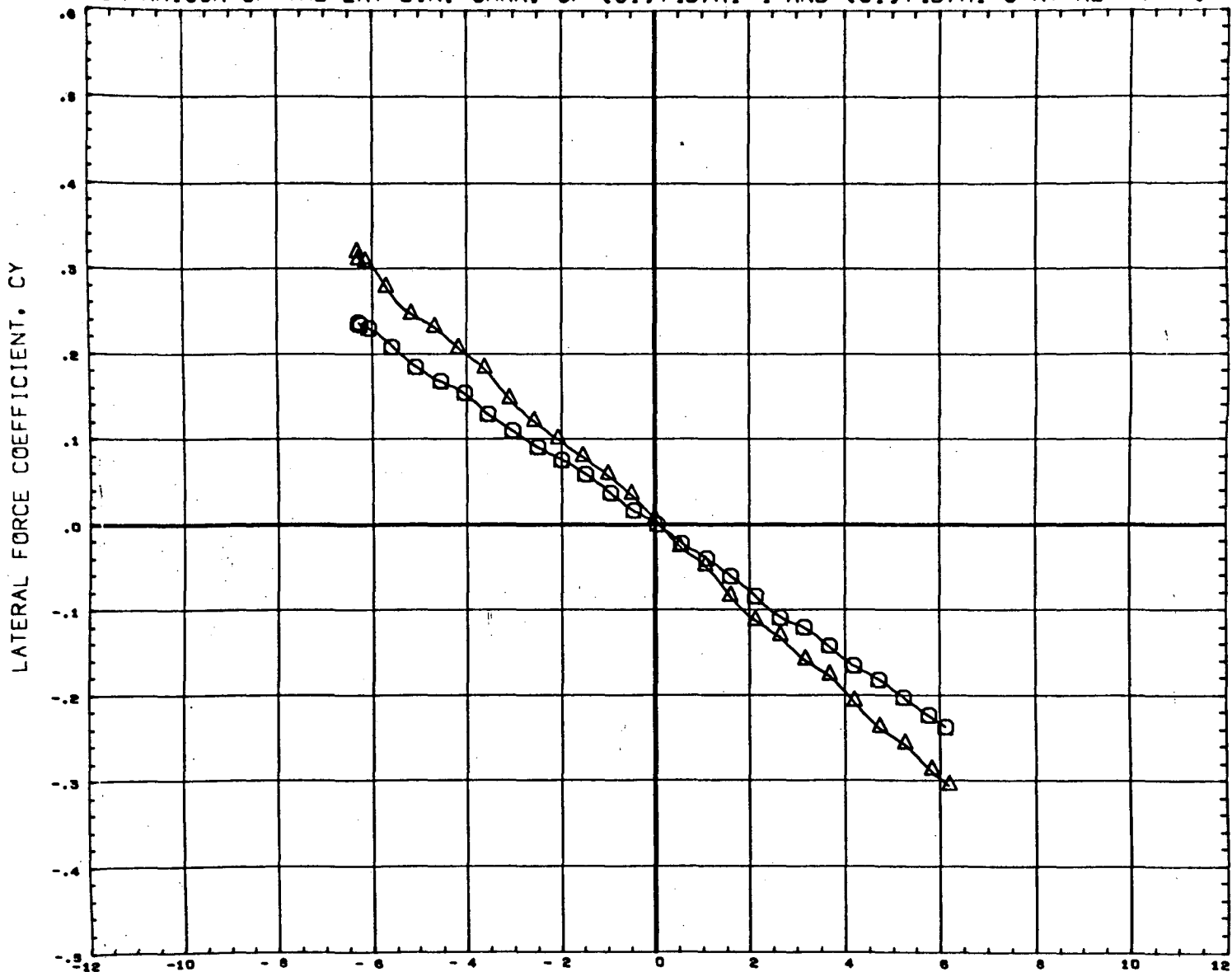


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74C9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 6.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (TD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 957.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

PAGE 588

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT ALPHA = 0



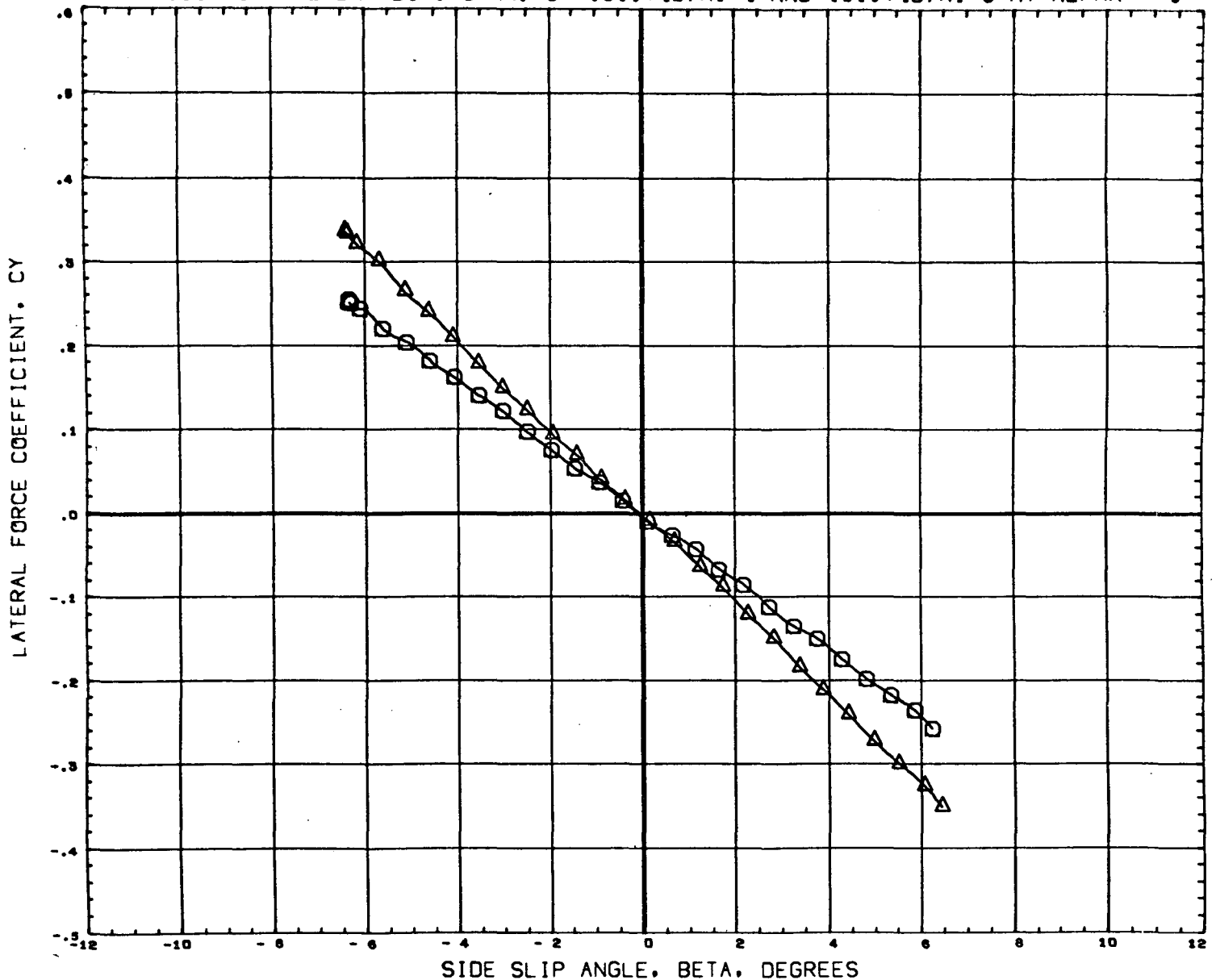
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (TD74C8) ○ | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (RD74E5) △ | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 |

| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | YMRP | 557.0004 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH .58

PAGE 589

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C8) (01)T4B7A1-4
(RD74E5) (01)T4B7A1-5

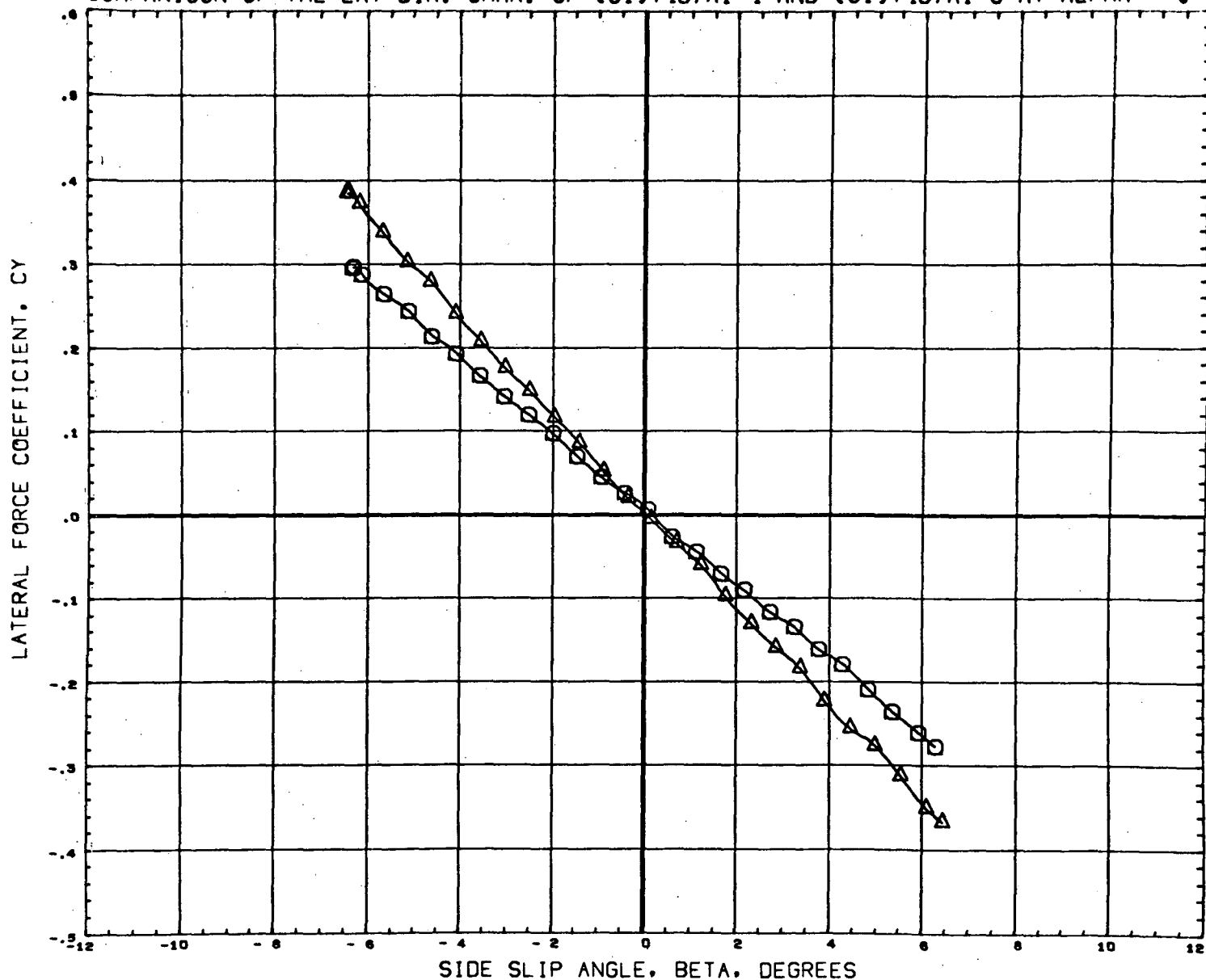
ALPHA ELEVTR AILRON RUDDER
0.000 0.000 0.000 0.000
0.000 0.000 0.000 0.000

REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060 SCALE

MACH .90

PAGE 590

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C8) (01)T4B7A1-4
(RD74E5) (01)T4B7A1-5

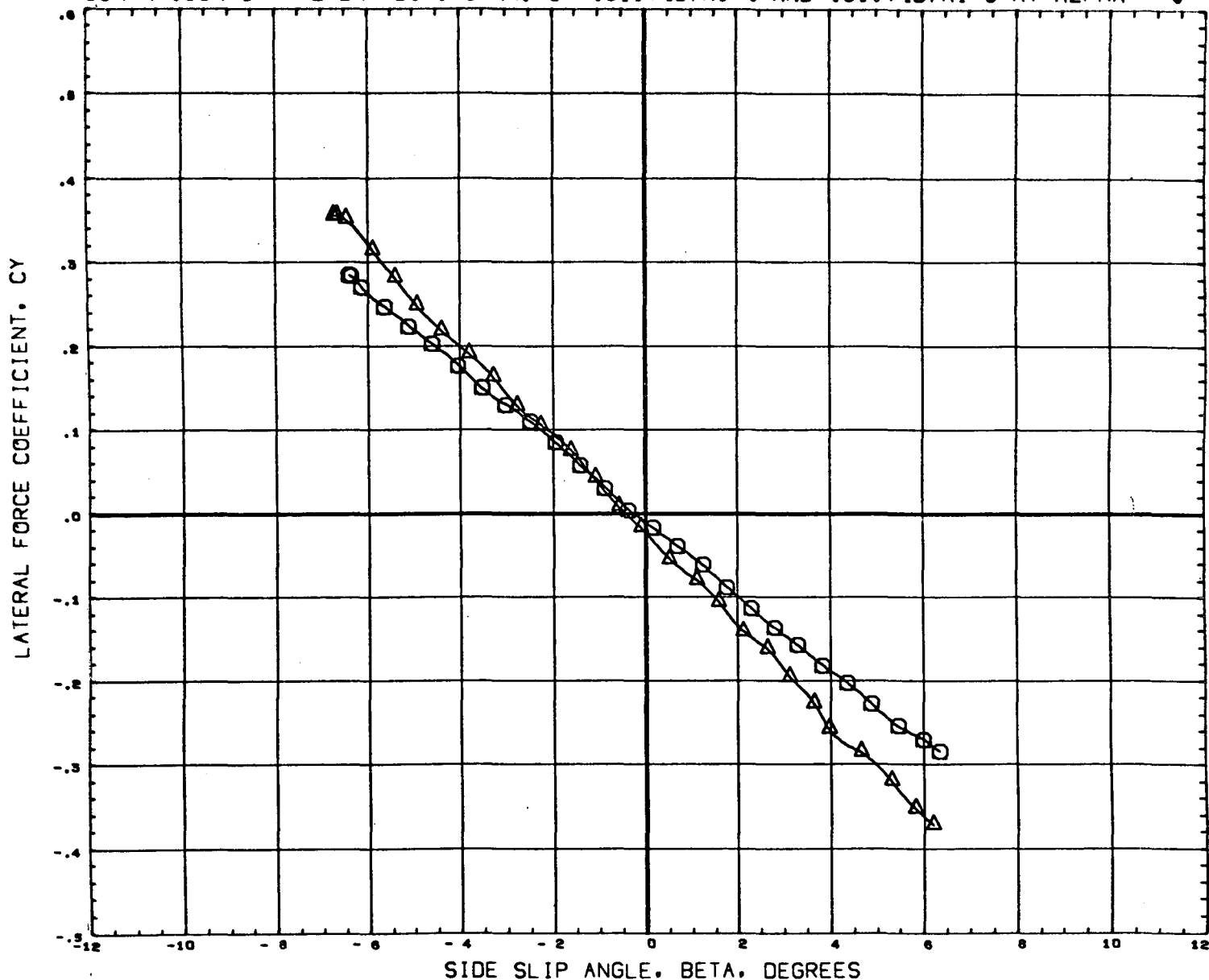
| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | sq.ft. |
| LREF | 609.5004 | IN. |
| BREF | 682.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 1.08

PAGE 591

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT ALPHA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74E5) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.3004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

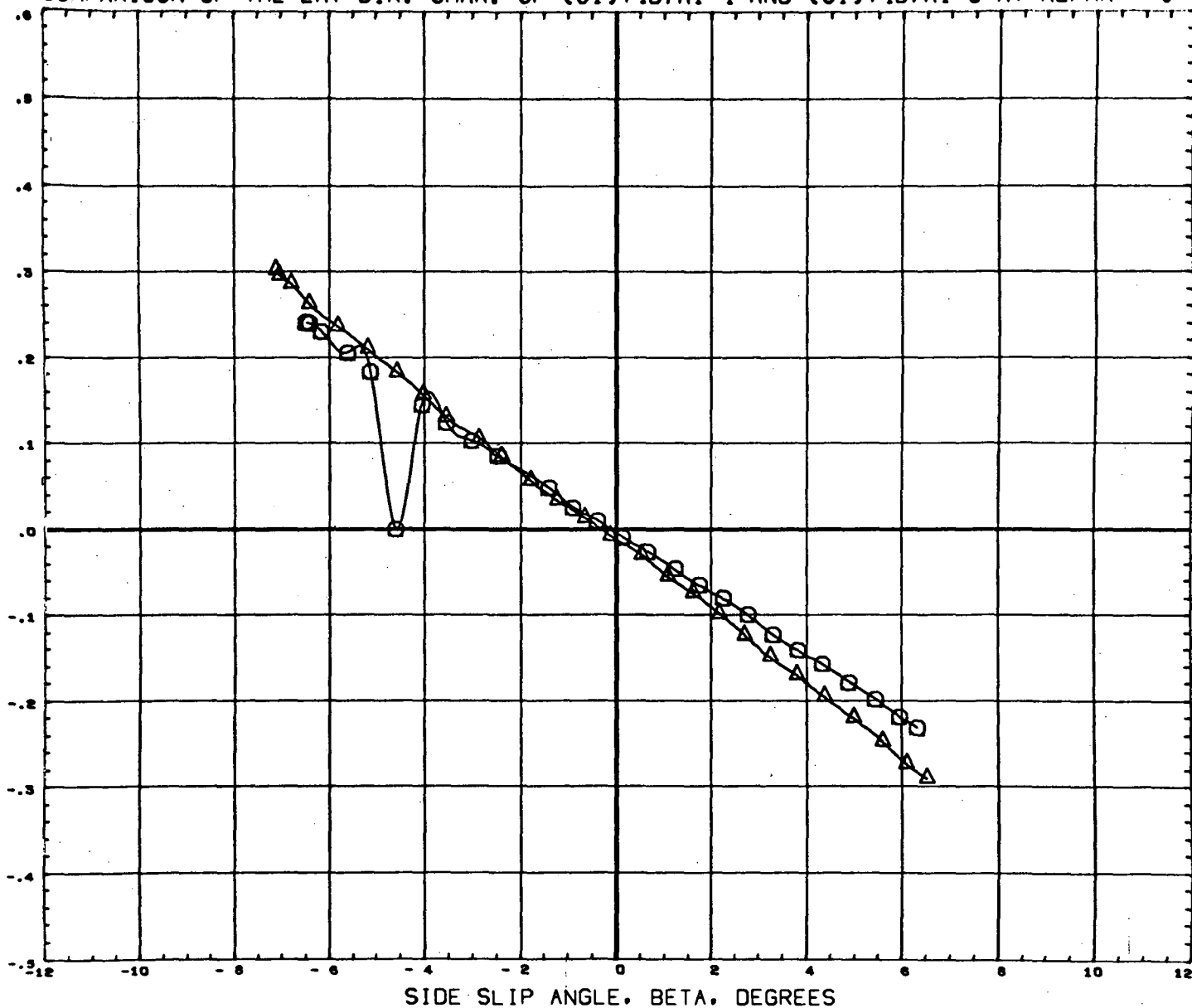
MACH

1.51

PAGE 592

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT ALPHA = 0

LATERAL FORCE COEFFICIENT, CY



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C8) (01)T4B7A1-4
(RD74E3) (01)T4B7A1-5

ALPHA 0.000
ELEVTR 0.000
AILRON 0.000
RUDDER 0.000

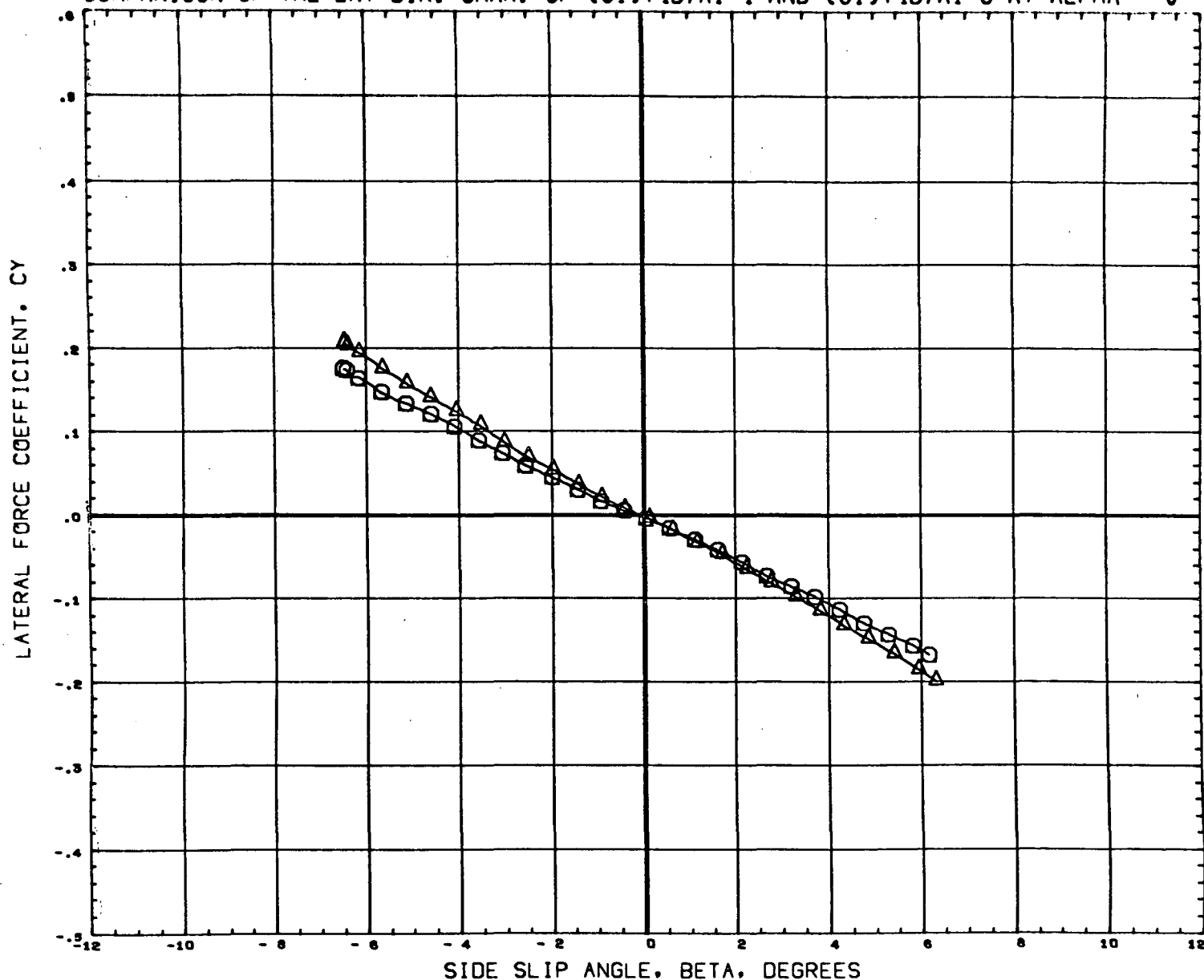
REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 682.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060 SCALE

MACH

2.20

PAGE 593

COMPARISON OF THE LAT-DIR. CHAR. OF (O1)T4B7A1-4 AND (O1)T4B7A1-5 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C8) \bigcirc MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-4
 (RD74E5) \triangle MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-5

| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | |
|-----------------------|------------------|
| SREF | 3155.3040 SQ.FT. |
| LREF | 609.5004 IN. |
| BREF | 892.0004 IN. |
| XMRP | 557.0004 IN. |
| YMRP | 0.0000 IN. |
| ZMRP | 200.0004 IN. |
| SCALE | 0.0060 SCALE |

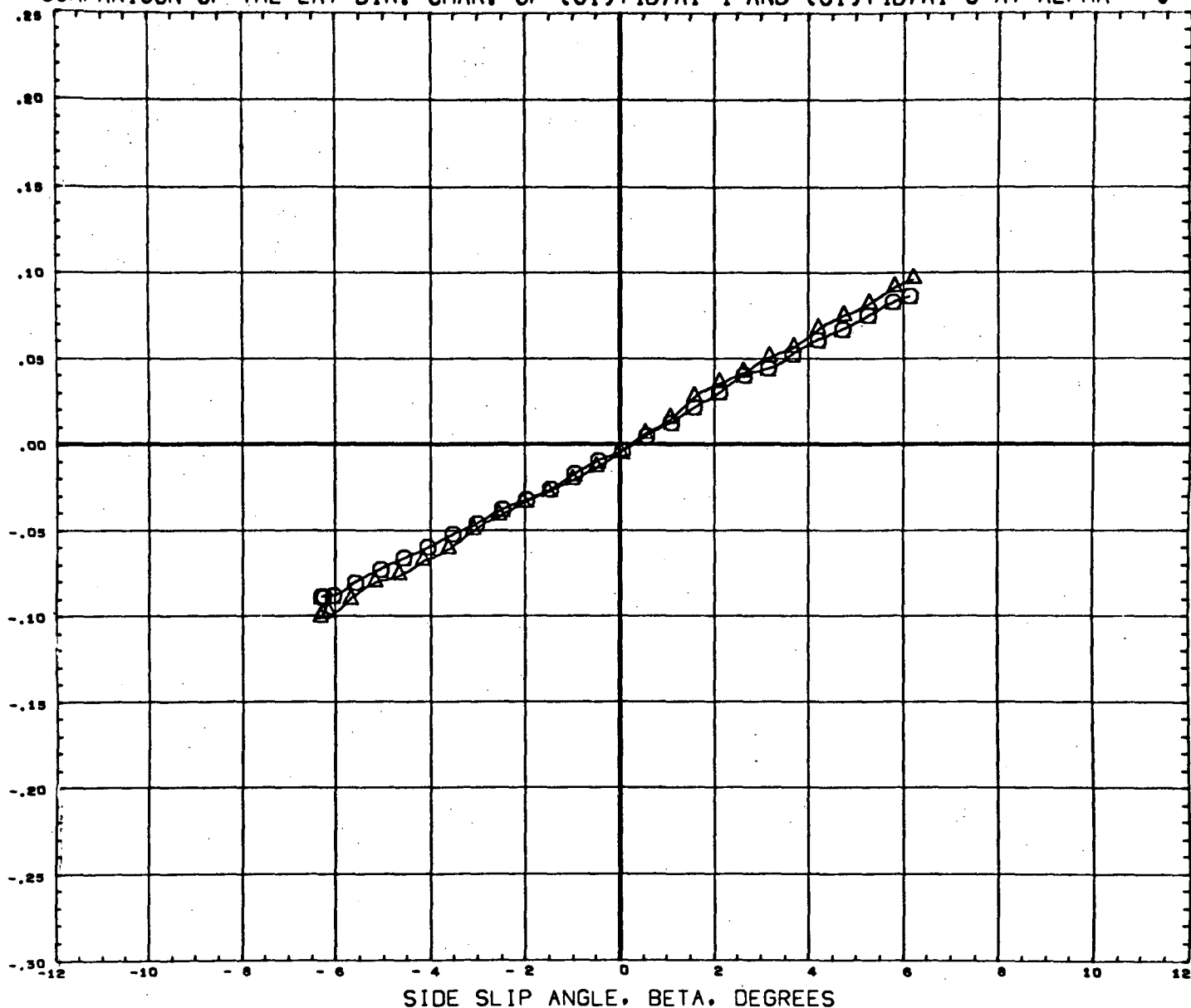
MACH

4.47

PAGE 594

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT ALPHA = 0

YAWING MOMENT COEFFICIENT, CYN (BODY AXIS)

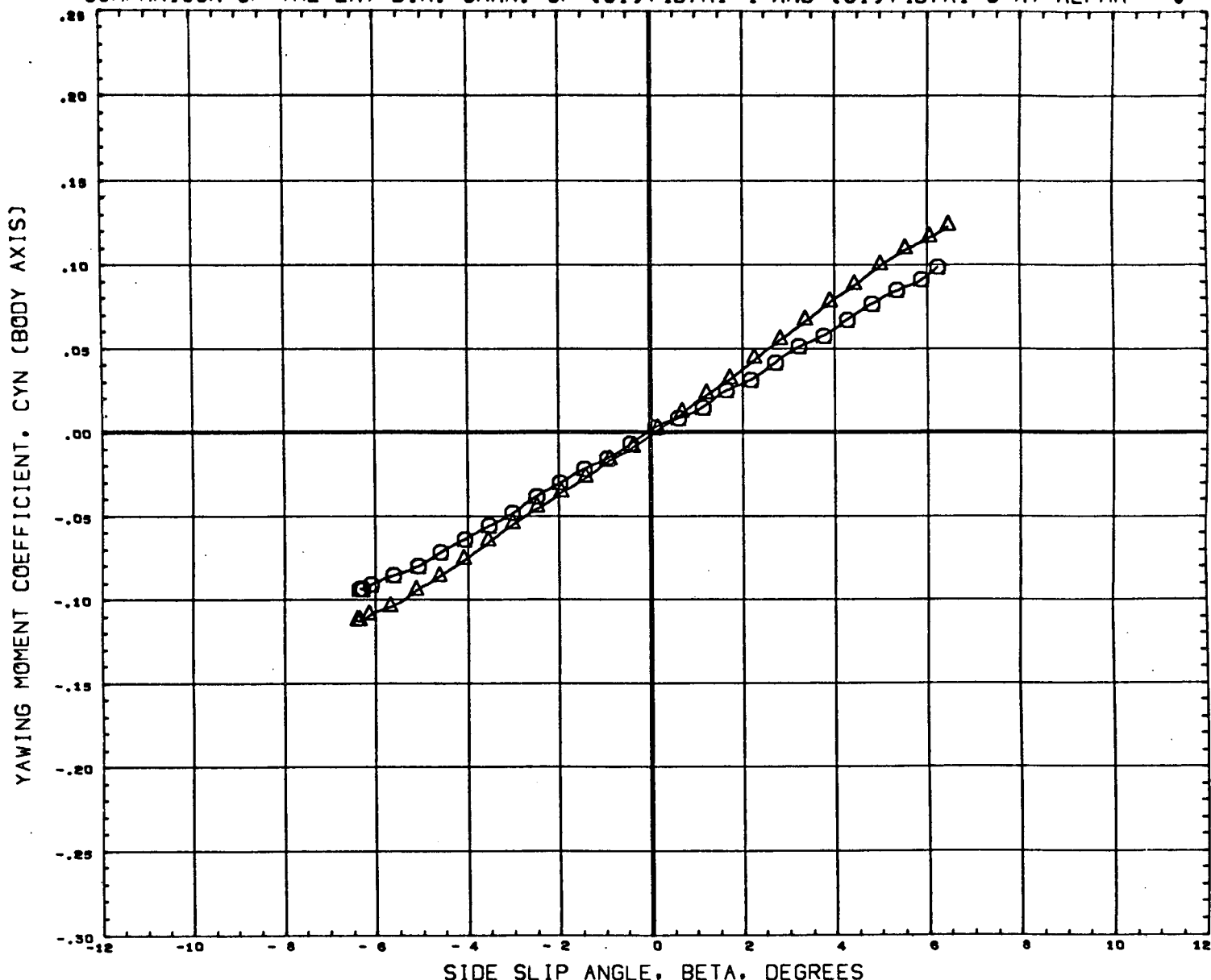


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74E9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 862.0004 IN. |
| | | | | | | XMRF | 557.0004 IN. |
| | | | | | | YMRF | 0.0000 IN. |
| | | | | | | ZMRF | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

PAGE 595

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C8) (01)T4B7A1-4
(RD74E5) (01)T4B7A1-5

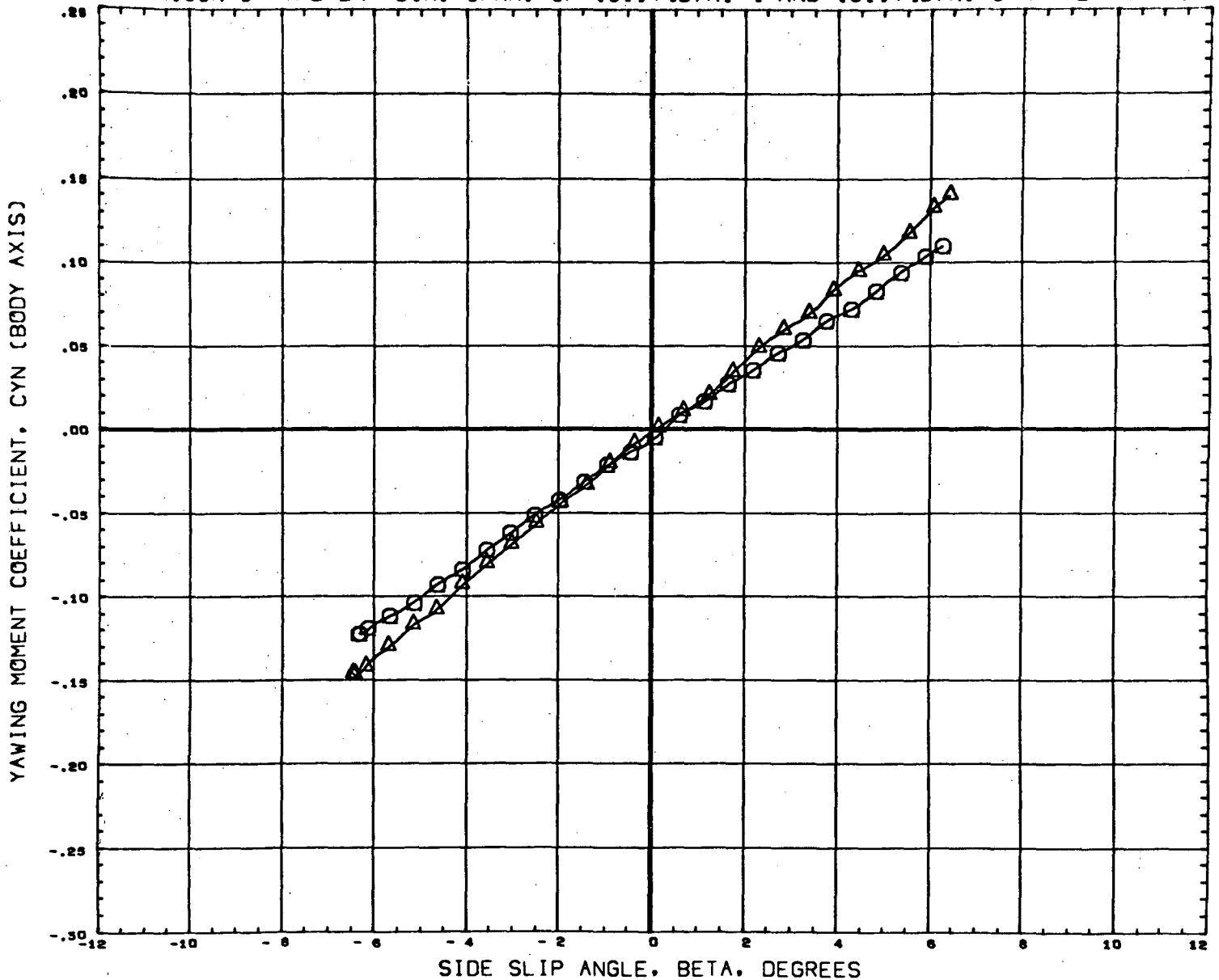
| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH .90

PAGE 596

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C8) (01)T4B7A1-4
(RD74E5) (01)T4B7A1-5

| ALPHA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 0.000 | 0.000 | 0.000 | 0.000 |

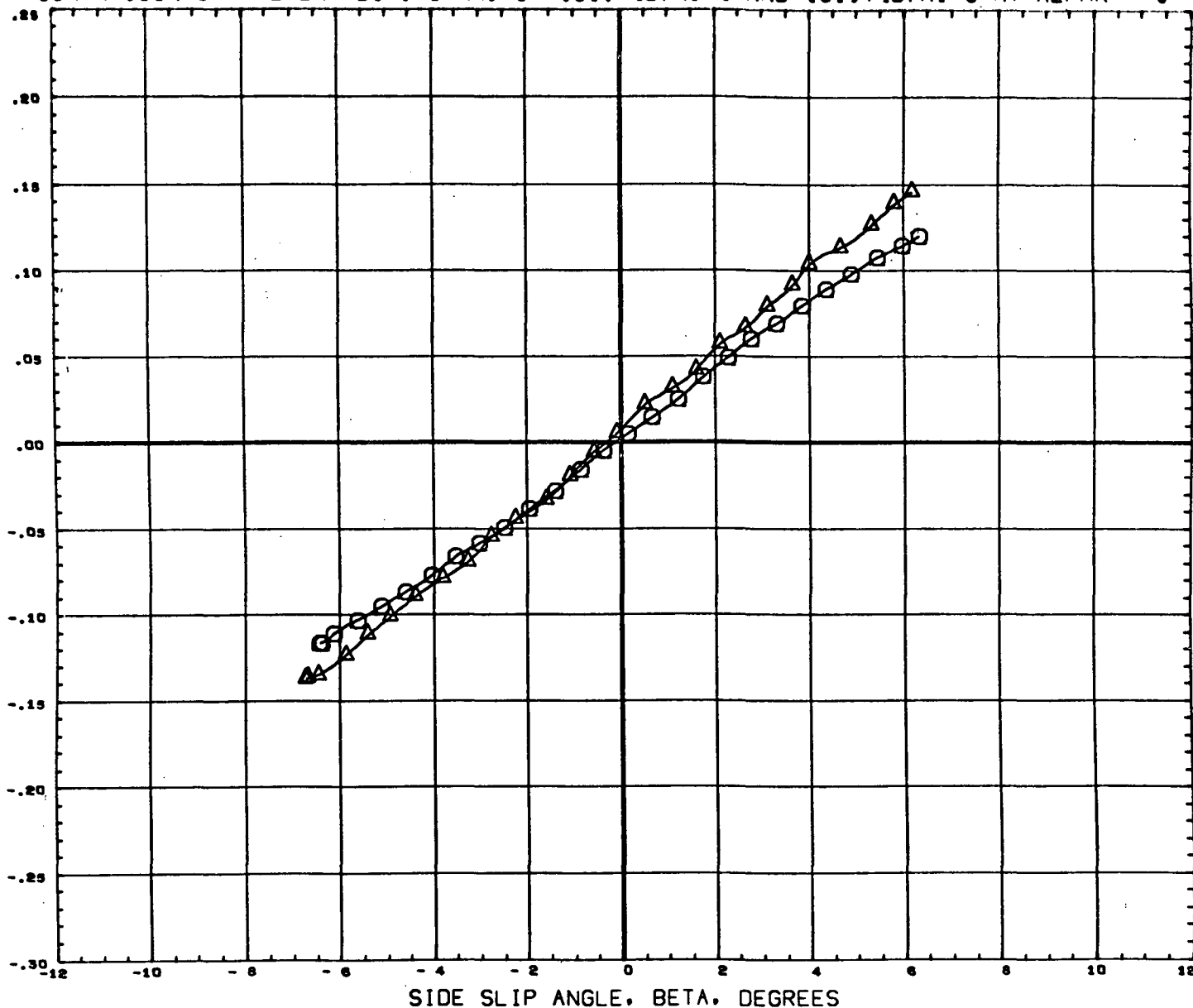
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 1.08

PAGE 597

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT ALPHA = 0

YAWING MOMENT COEFFICIENT, CYN (BODY AXIS)

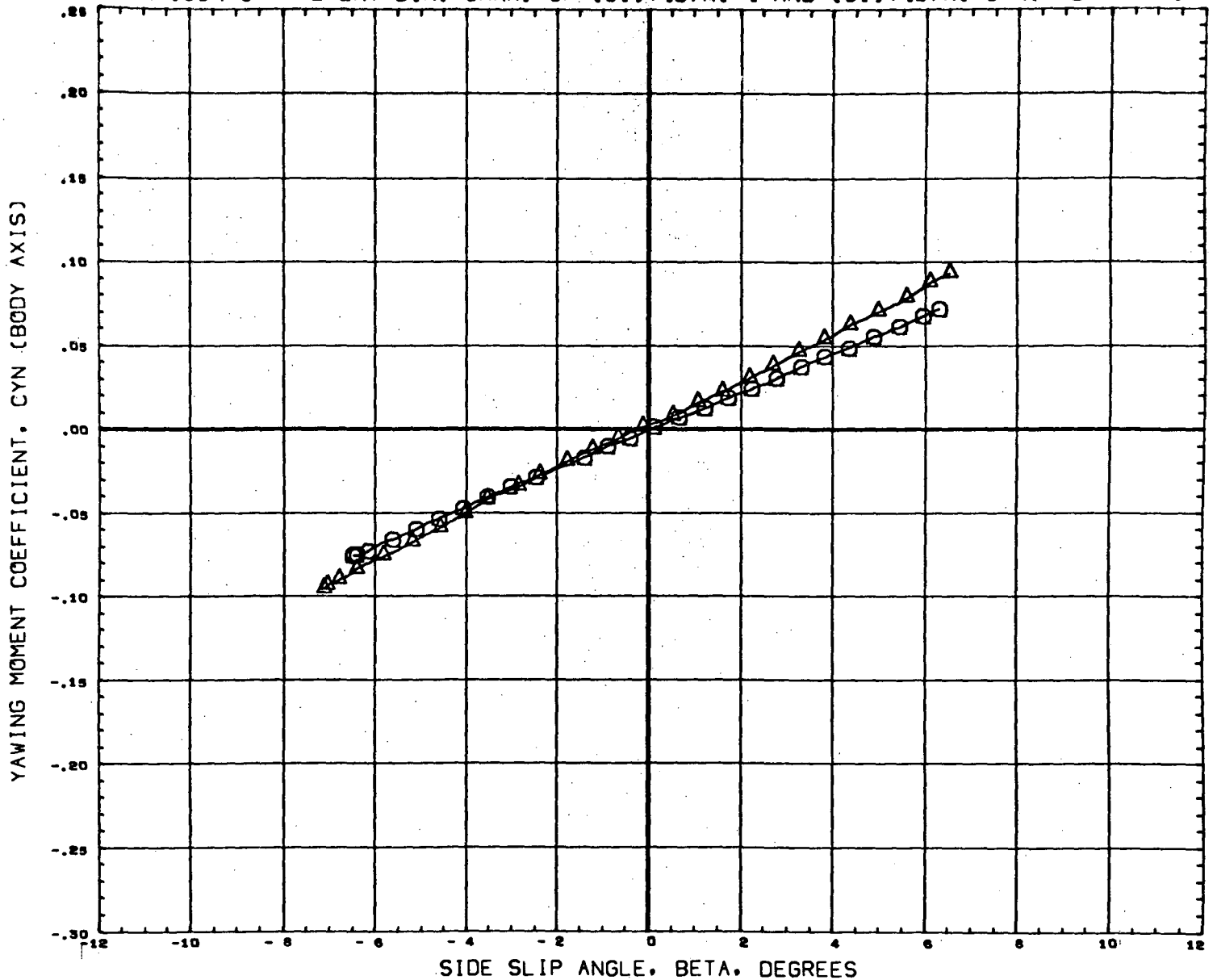


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AIRON | RUDDER | REFERENCE INFORMATION | | |
|-----------------|---|-------|--------|-------|--------|-----------------------|-----------|--------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | SQ.FT. |
| (RD74E5) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 | IN. |
| | | | | | | BREF | 882.0004 | IN. |
| | | | | | | XMRF | 557.0004 | IN. |
| | | | | | | YMRF | 0.0000 | IN. |
| | | | | | | ZMRF | 200.0004 | IN. |
| | | | | | | SCALE | 0.0060 | SCALE |

MACH 1.51

PAGE 598

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT ALPHA = 0

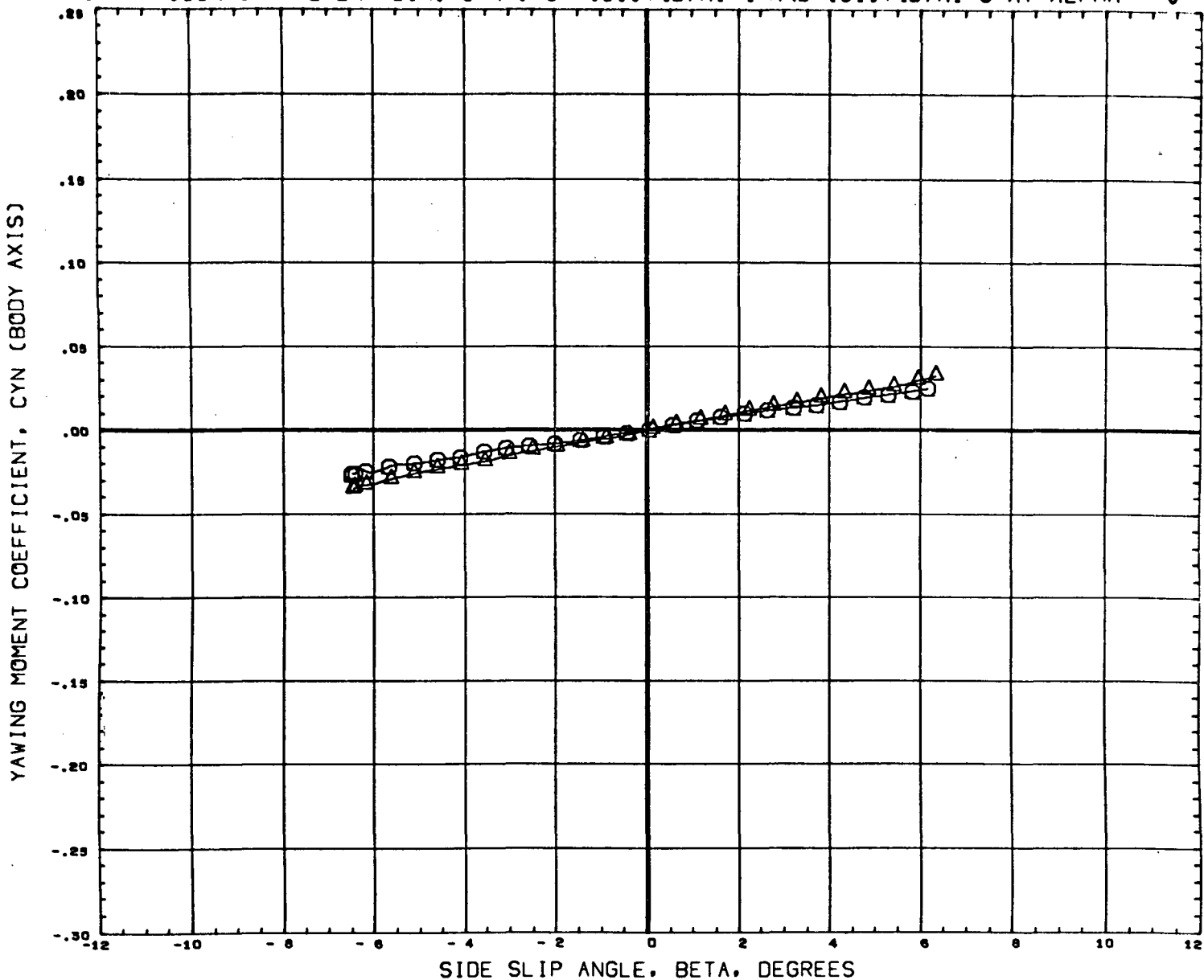


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74E5) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

PAGE 599

COMPARISON OF THE LAT-DIR. CHAR. OF (O1)T4B7A1-4 AND (O1)T4B7A1-5 AT ALPHA = 0



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C8) (O) MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-4
(RD74E5) (A) MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-5

ALPHA 0.000 ELEVTR 0.000 AILRON 0.000 RUDDER 0.000
0.000 0.000 0.000 0.000

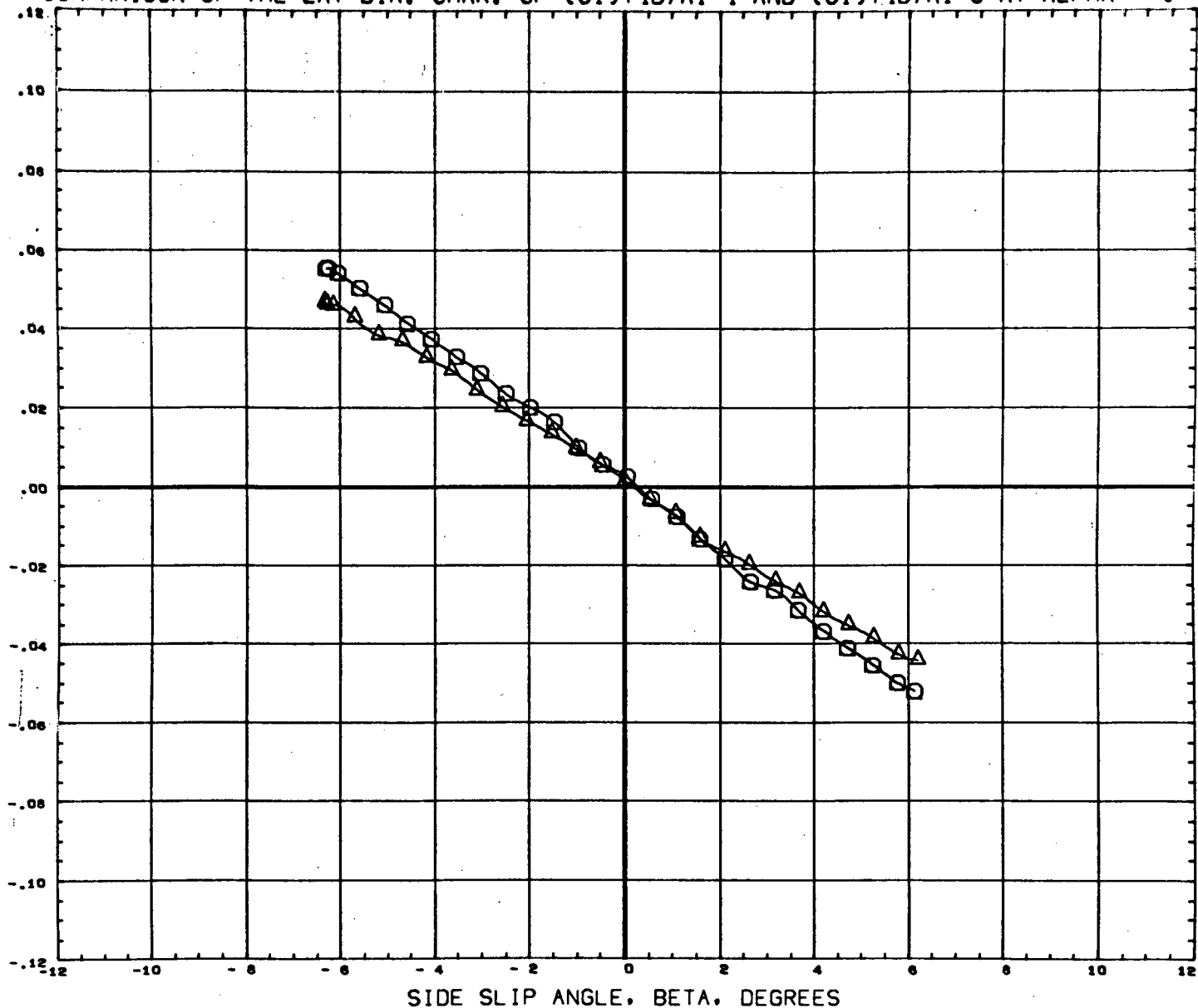
REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060 SCALE

MACH 4.47

PAGE 600

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT ALPHA = 0

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(TD74C8) (01)T4B7A1-4
(RD74E5) (01)T4B7A1-5

ALPHA 0.000
ELEVTR 0.000
AILRON 0.000
RUDDER 0.000

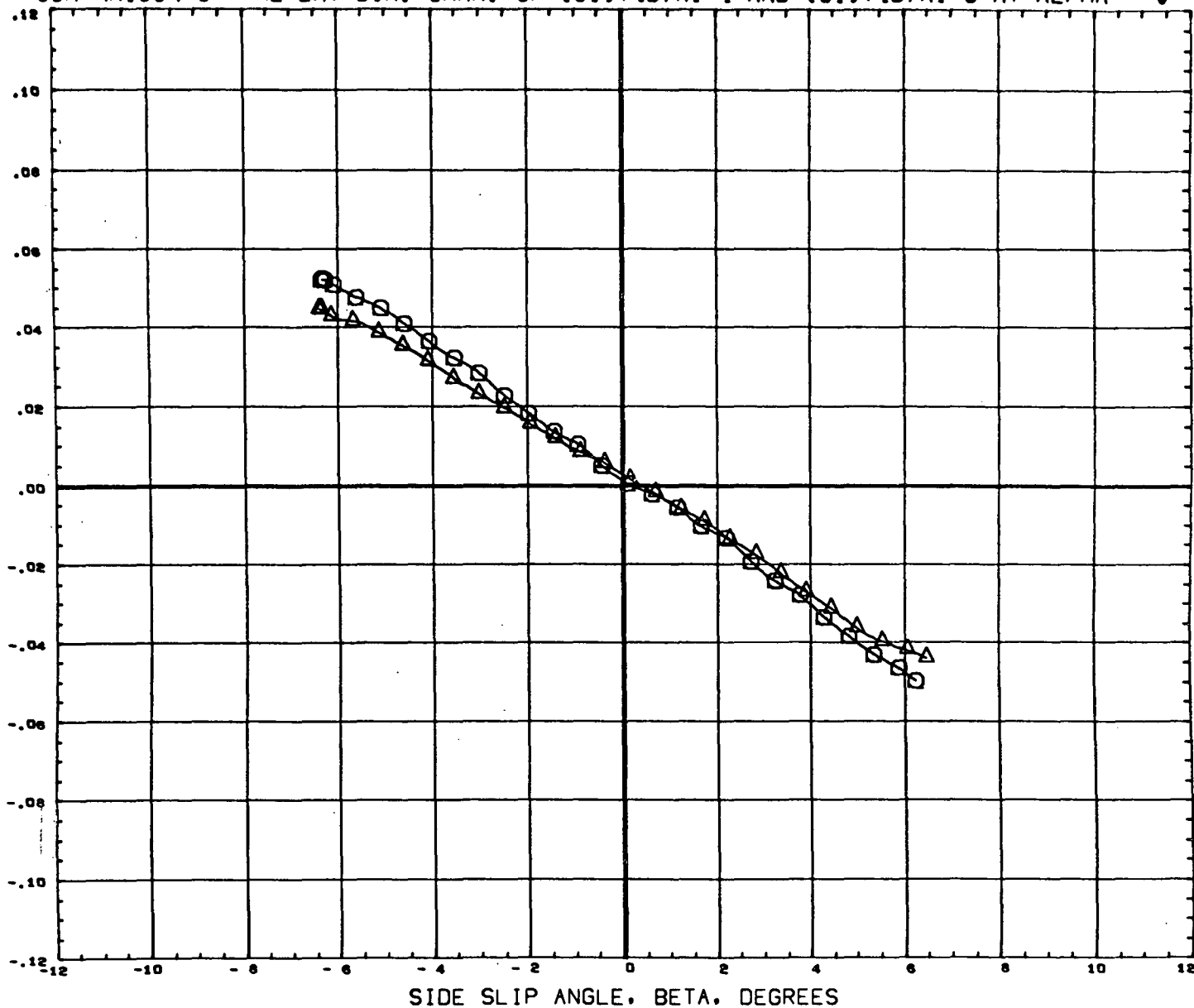
REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060 SCALE

MACH .58

PAGE 601

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT ALPHA = 0

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



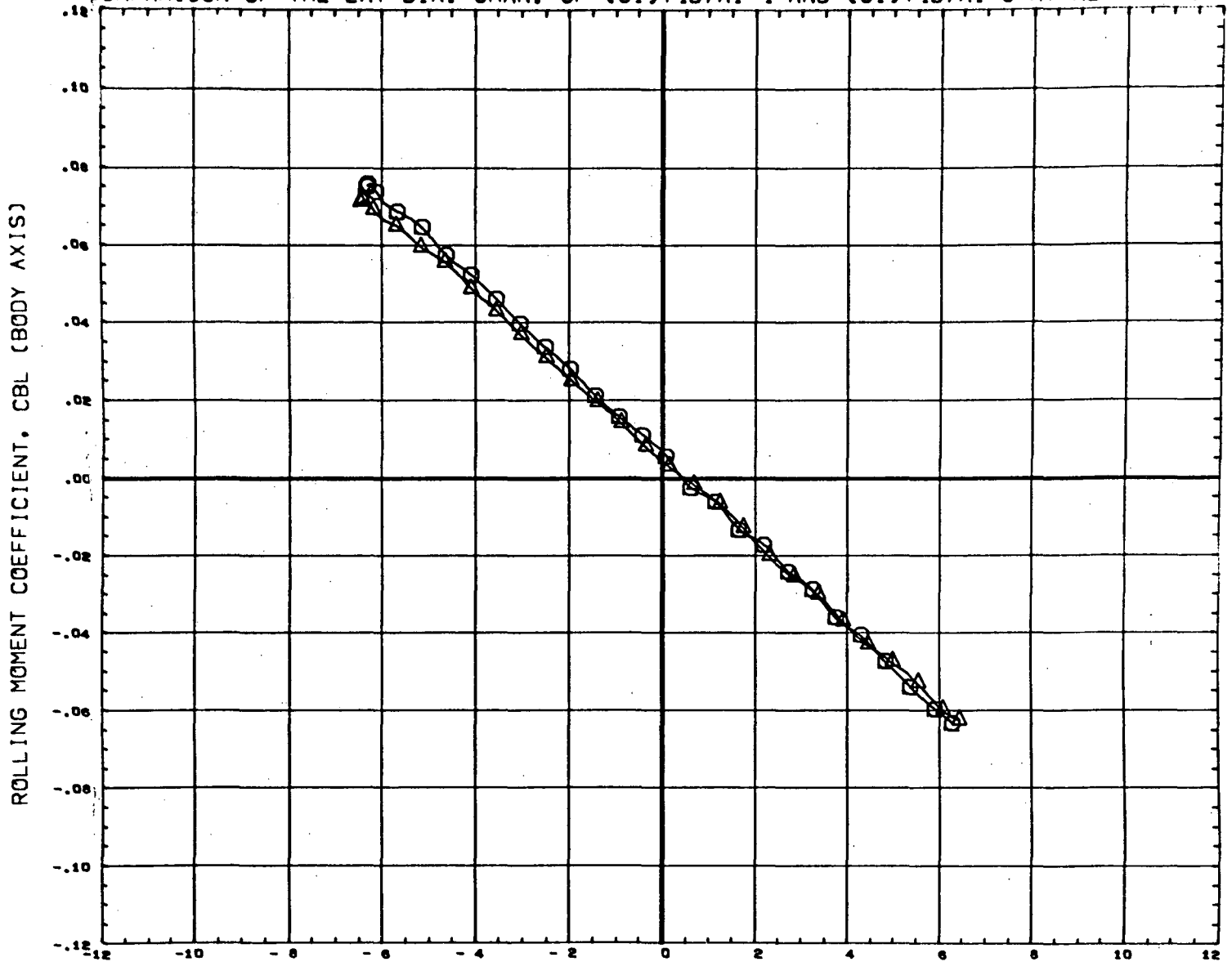
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (RD74E5) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 |

| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH .90

PAGE 602

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT ALPHA = 0



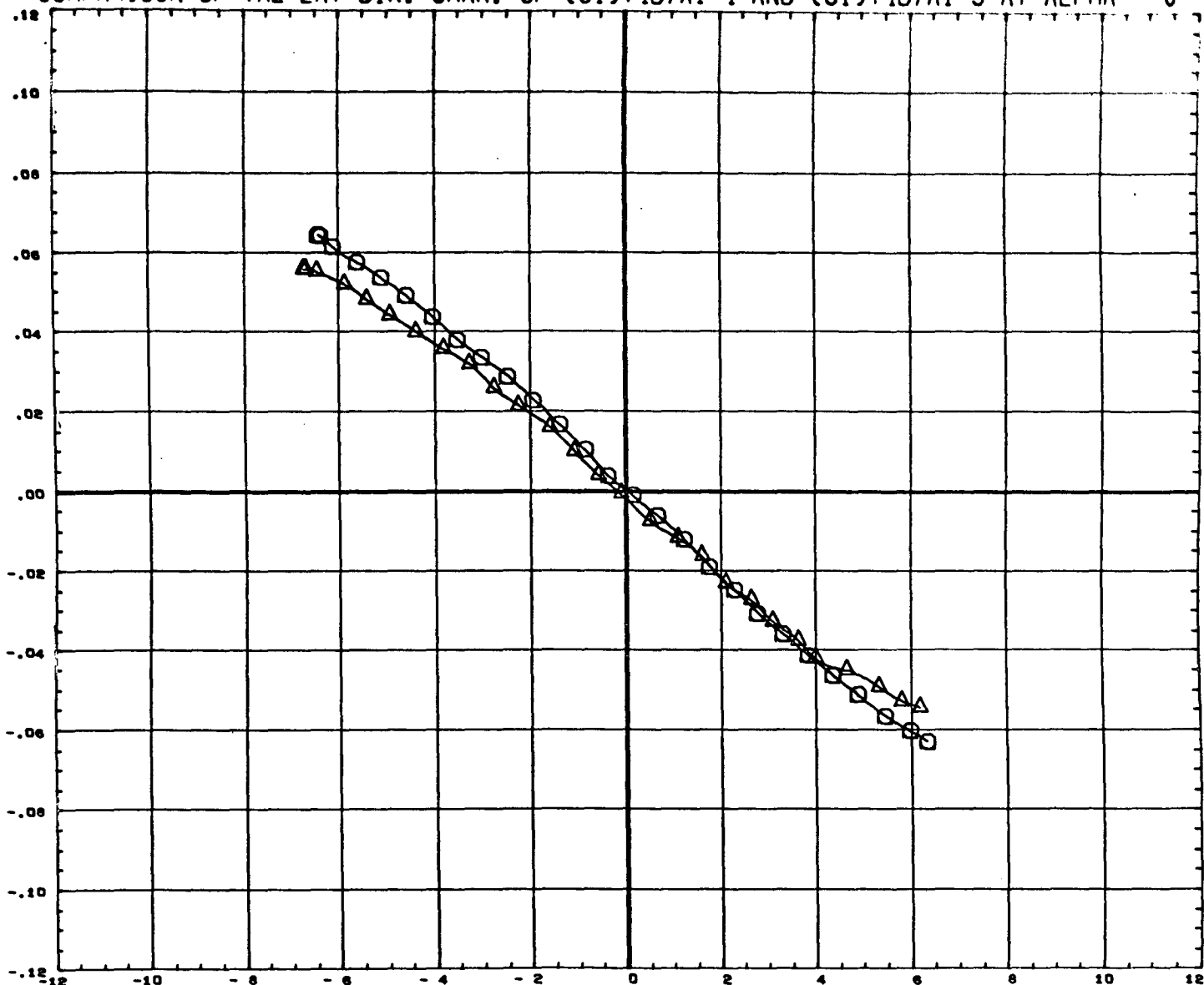
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74E5) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.3004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.08

PAGE 603

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT ALPHA = 0

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



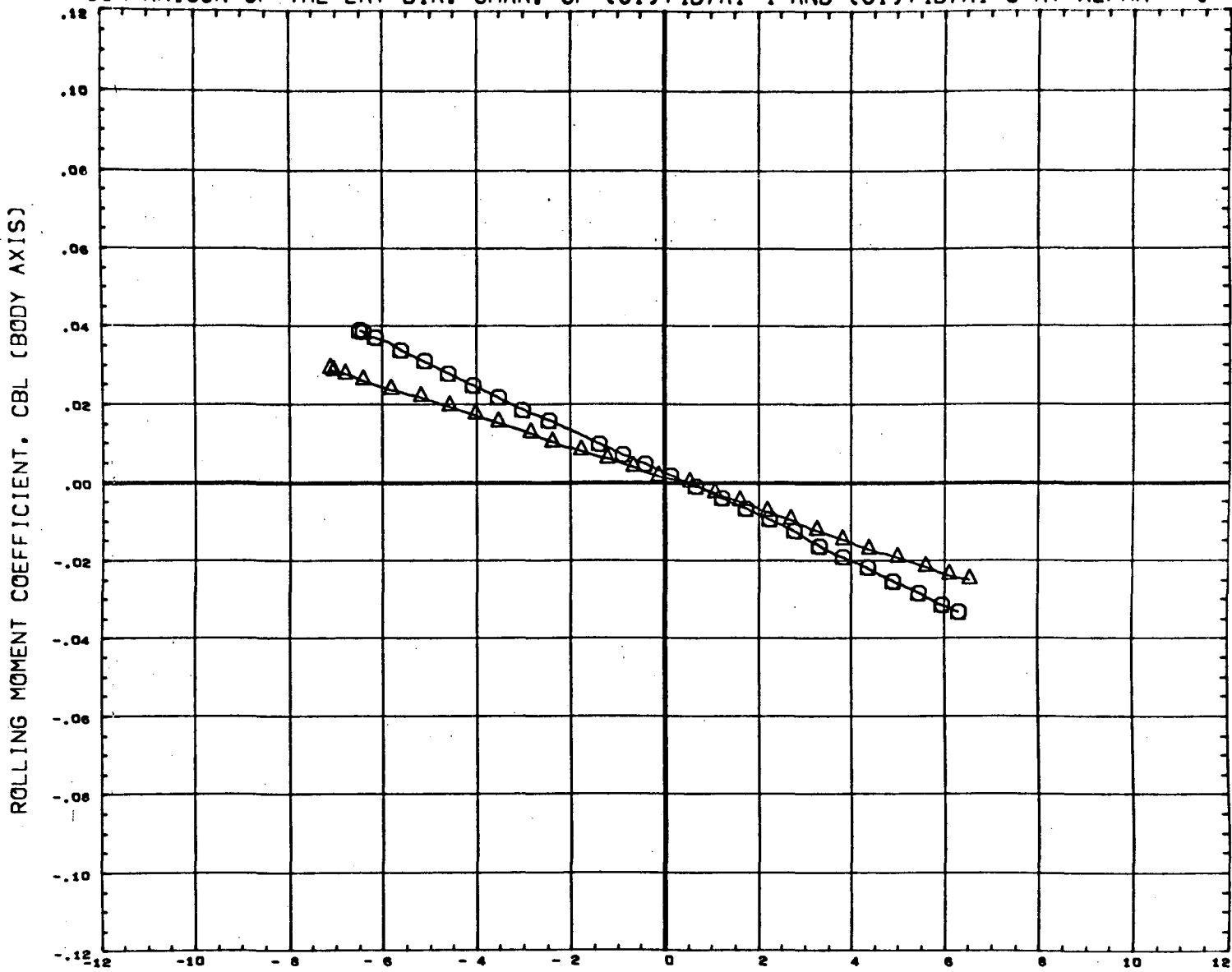
SIDE SLIP ANGLE, BETA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | NDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74E5) | NDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 862.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.51

PAGE 604

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT ALPHA = 0



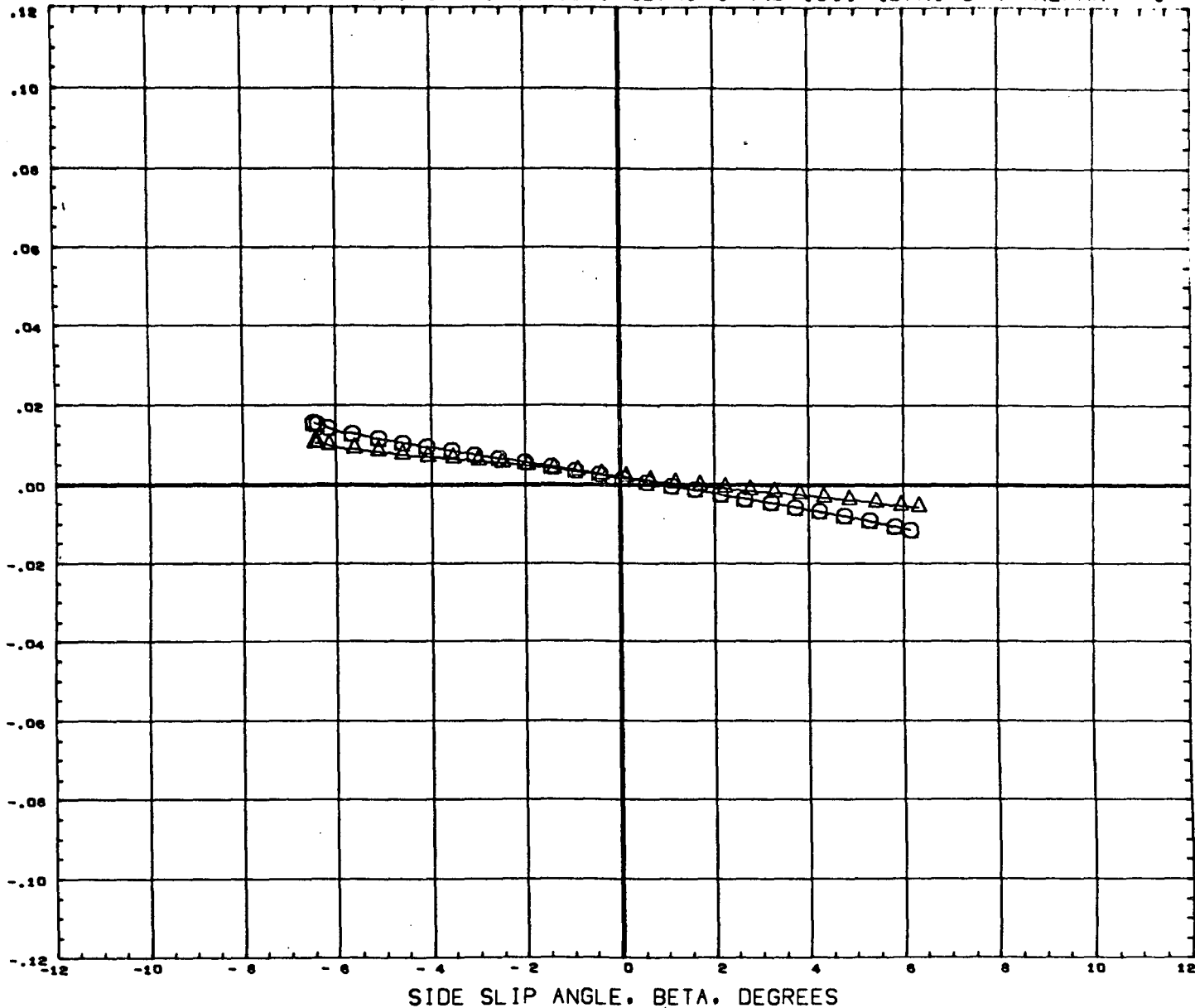
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 |
| (RD74E5) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 |

| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.3004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 2.20

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT ALPHA = 0

ROLLING MOMENT COEFFICIENT, CBL (BODY AXIS)



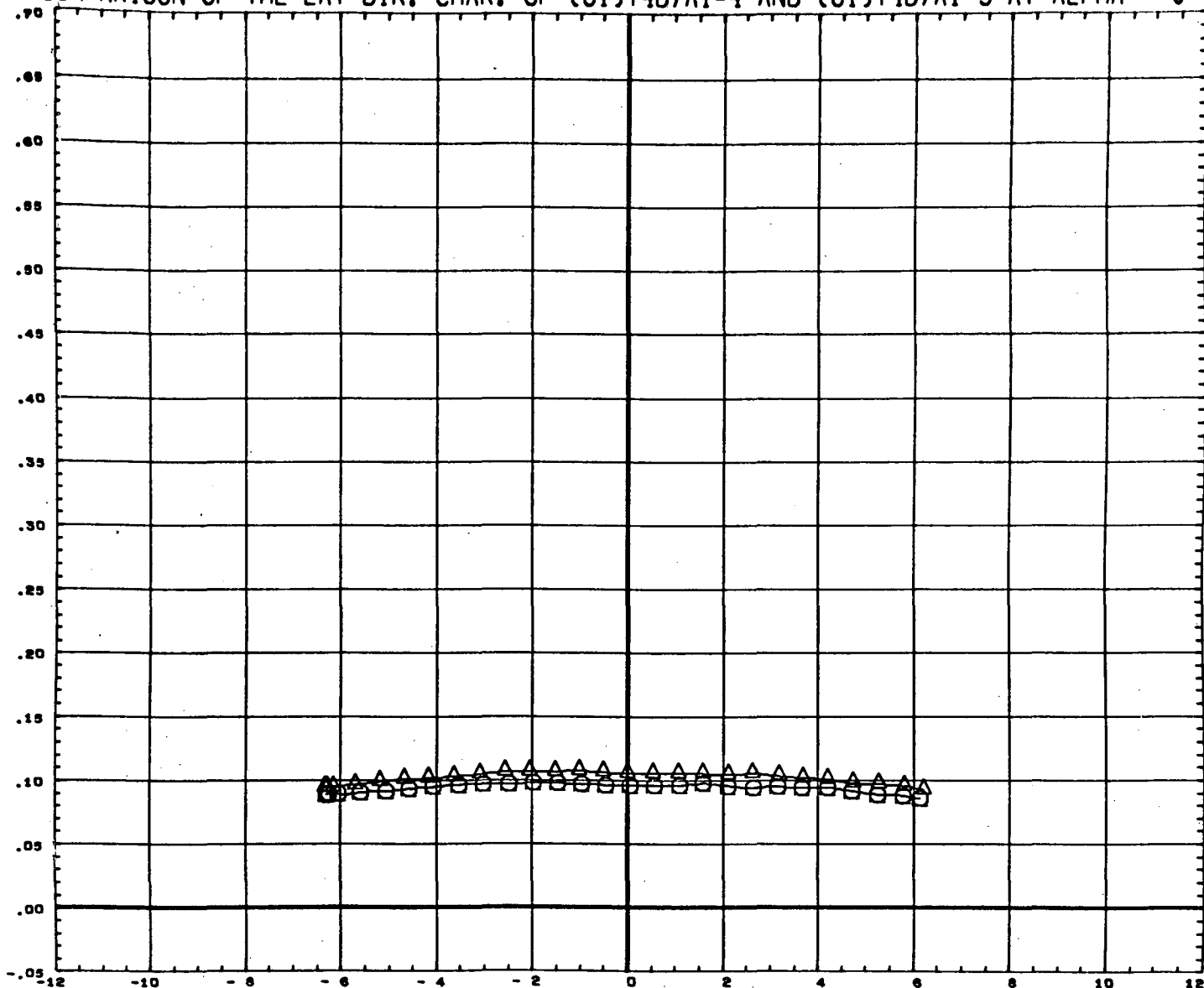
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74E5) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 682.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

PAGE 606

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT ALPHA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



SIDE SLIP ANGLE, BETA, DEGREES

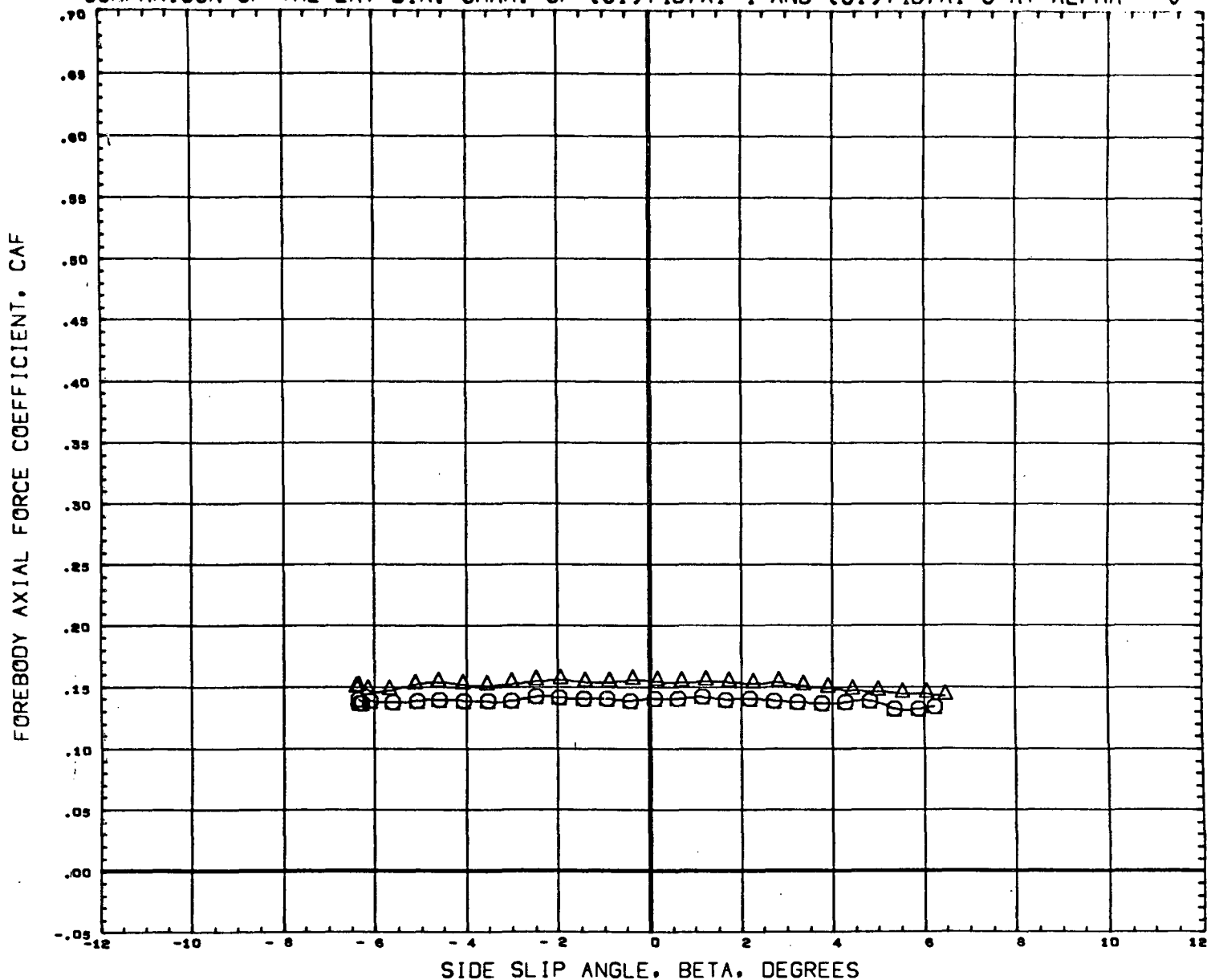
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (0D74C8) | MDAC S-222 COMPOSITE (T-C6) (01)T4B7A1-4 |
| (0D74E5) | MDAC S-222 COMPOSITE (T-C6) (01)T4B7A1-5 |

| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 537.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH .58

PAGE 607

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT ALPHA = 0



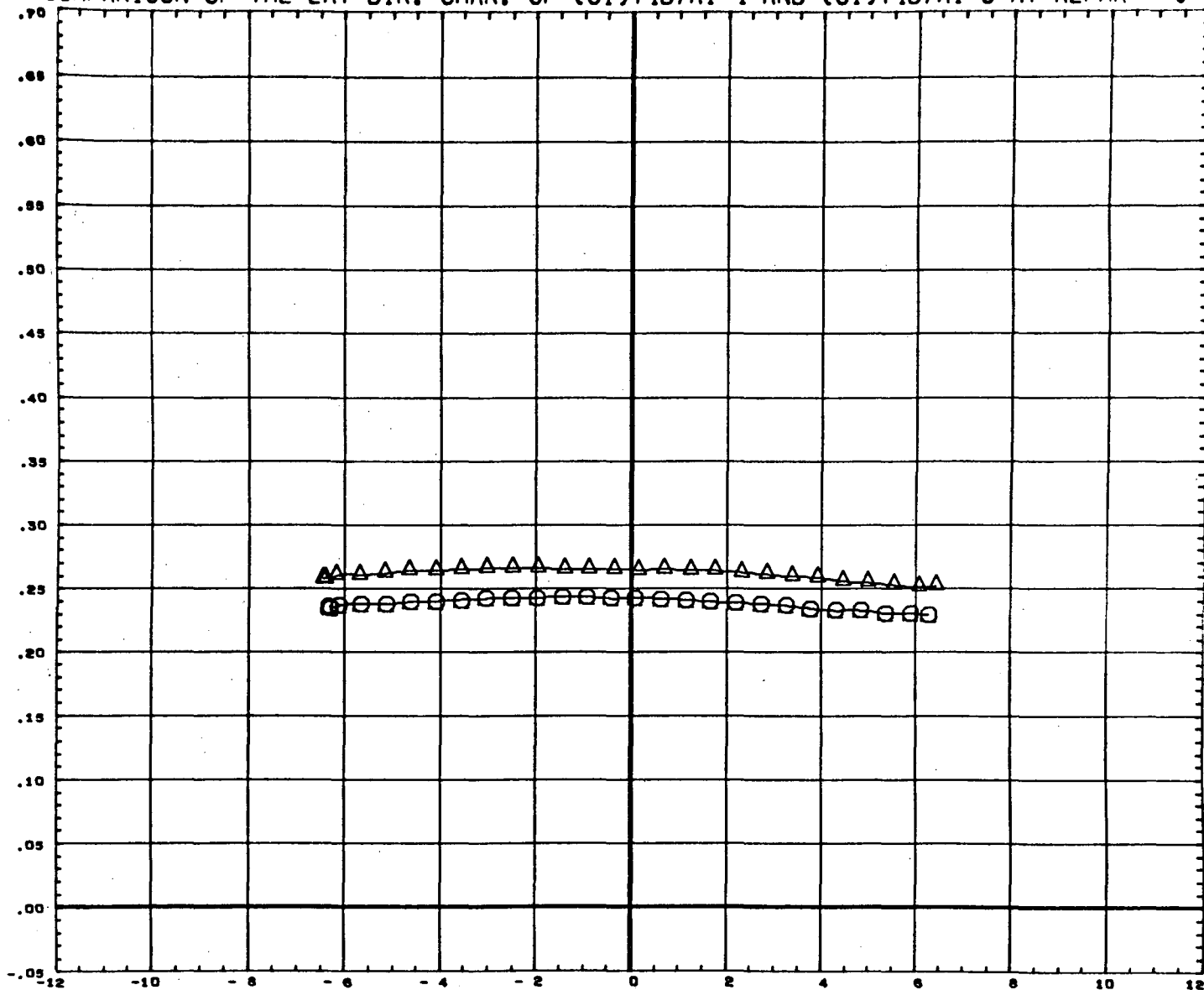
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74E9) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

PAGE 608

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT ALPHA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF



SIDE SLIP ANGLE, BETA, DEGREES

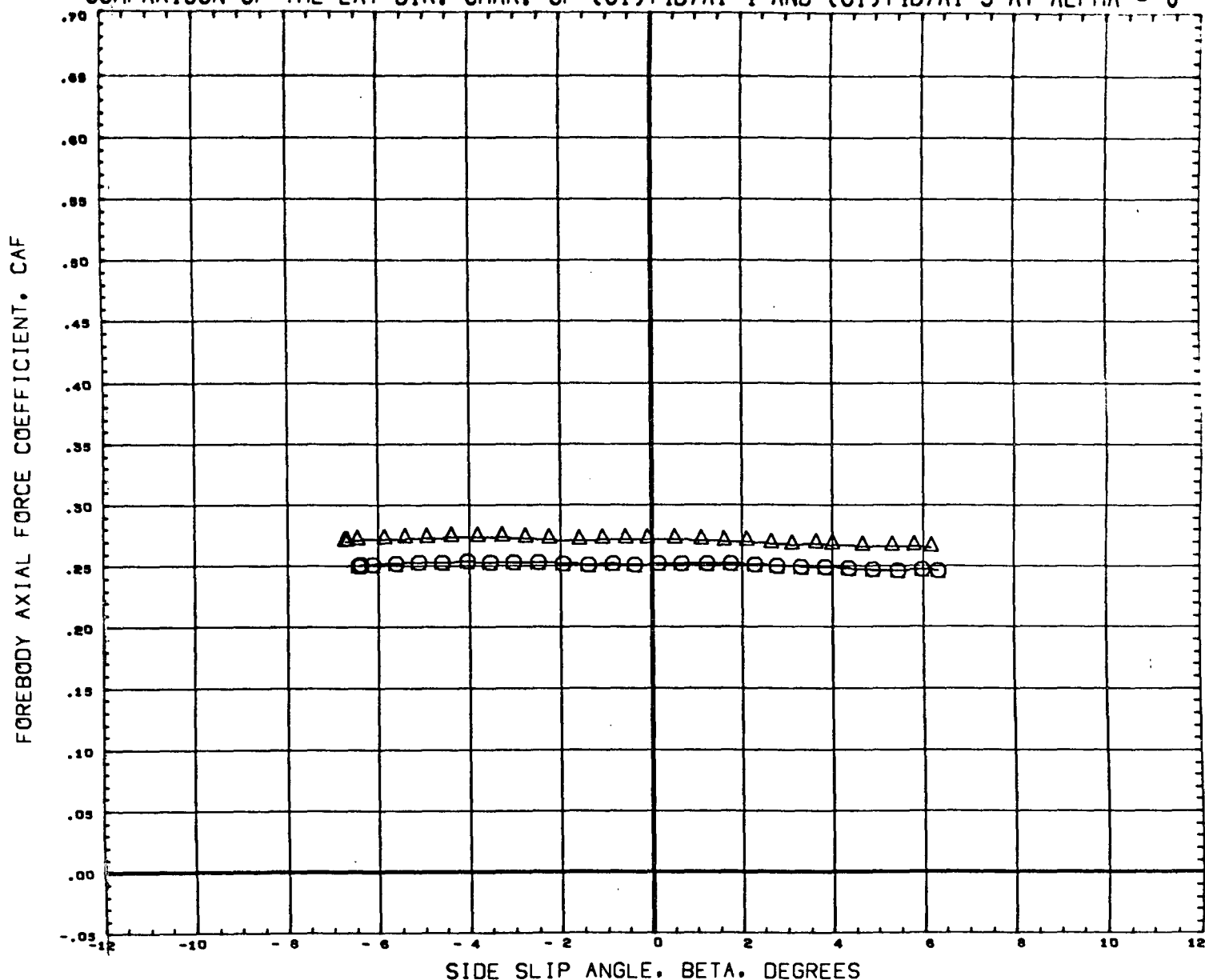
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74E9) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH

1.08

PAGE 609

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT ALPHA = 0



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74E5) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | YMRP | 557.0004 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

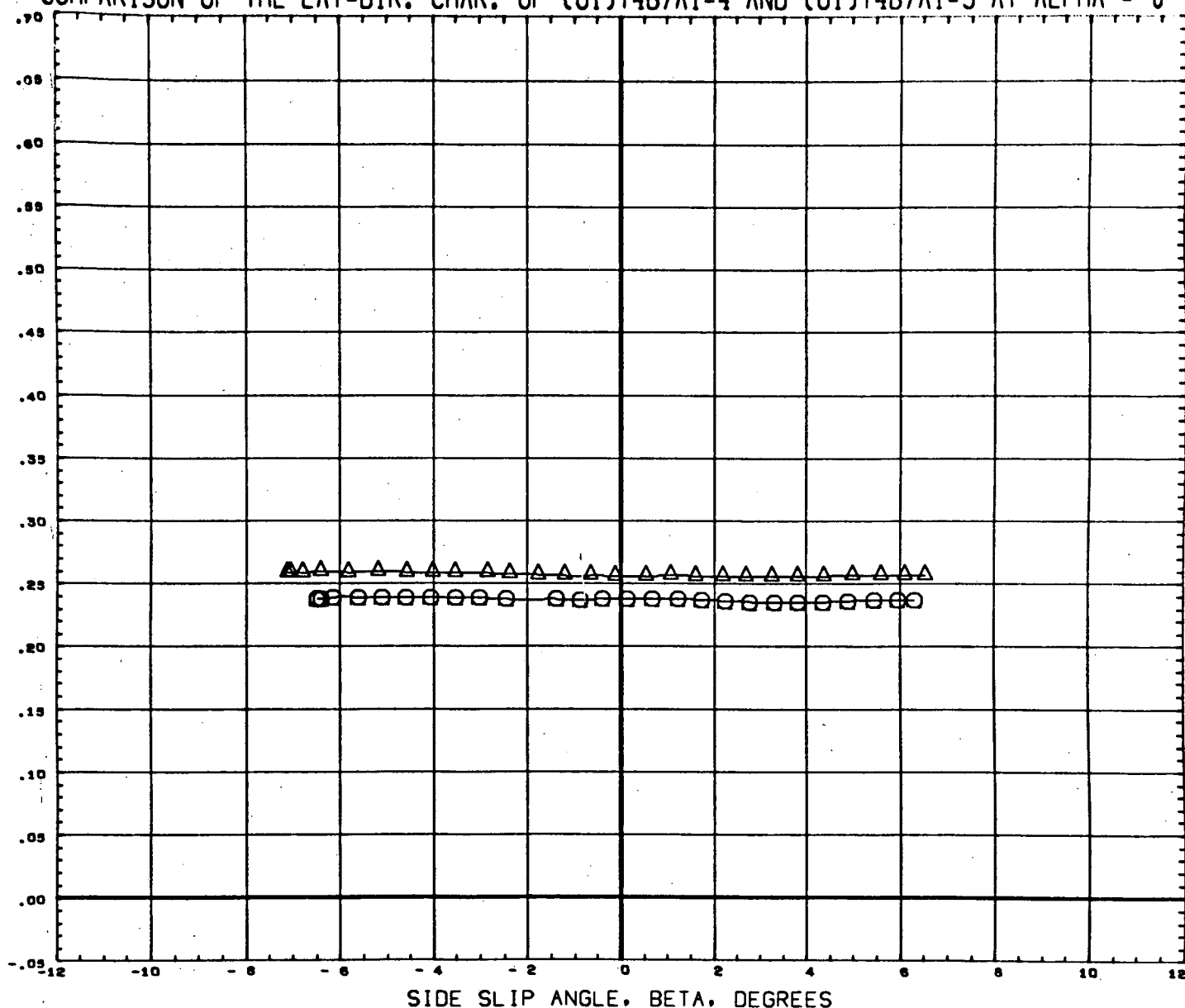
MACH

1.51

PAGE 610

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT ALPHA = 0

FOREBODY AXIAL FORCE COEFFICIENT, CAF

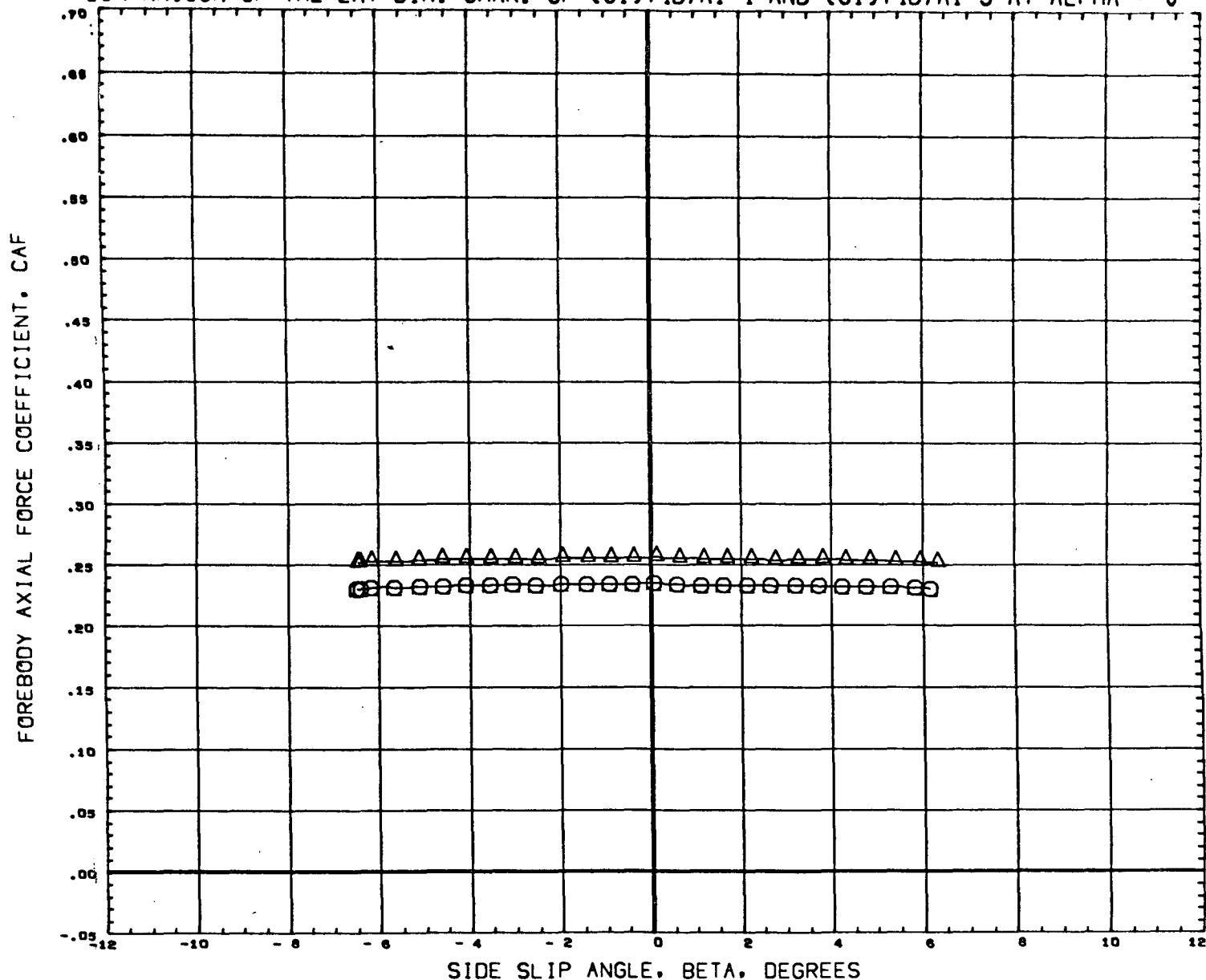


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (TD74C8) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (RD74E5) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

PAGE 611

COMPARISON OF THE LAT-DIR. CHAR. OF (01)T4B7A1-4 AND (01)T4B7A1-5 AT ALPHA = 0



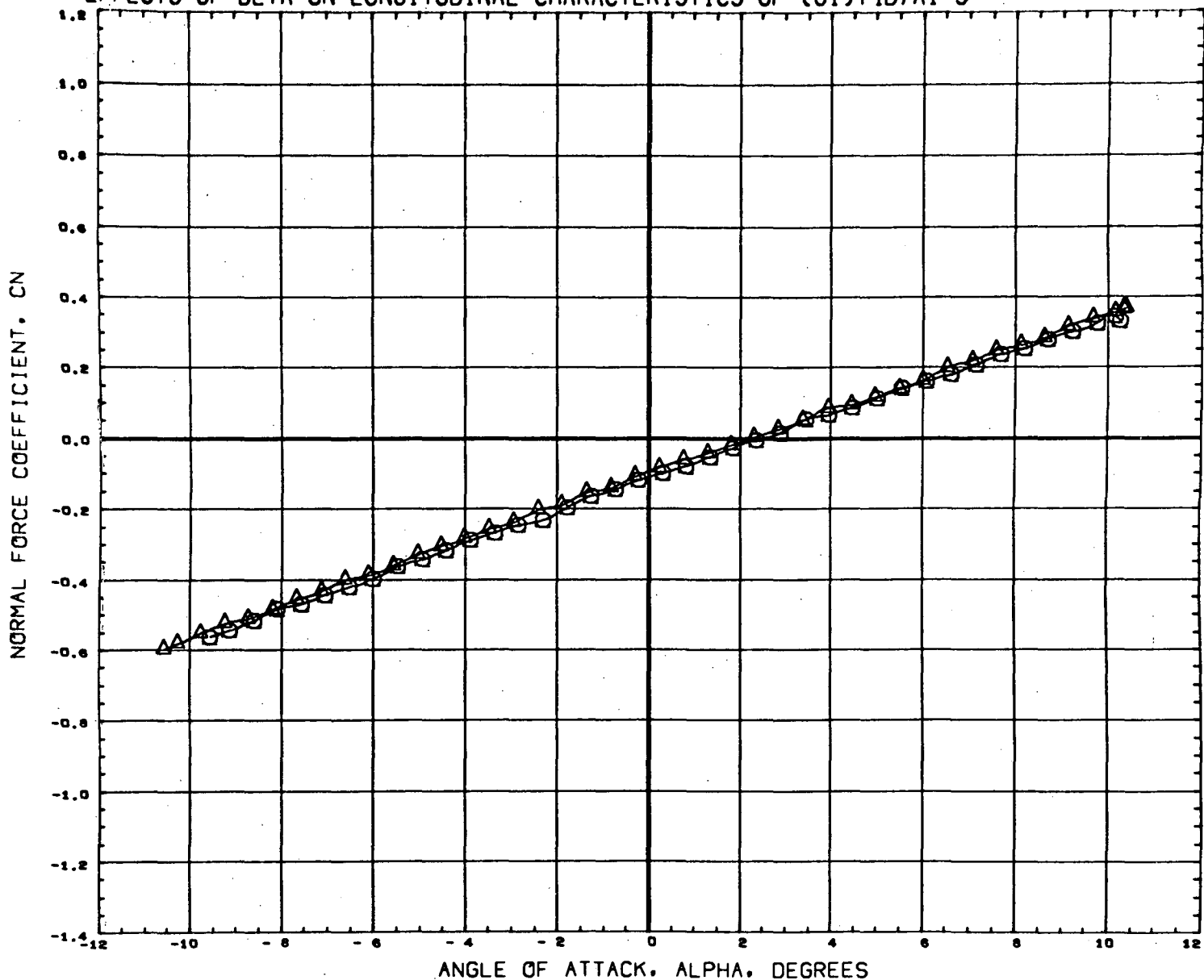
DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (TD74C8) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-4
 (RD74E5) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

| ALPHA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 4.47

PAGE 612

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



DATA SET SYMBOL CONFIGURATION DESCRIPTION

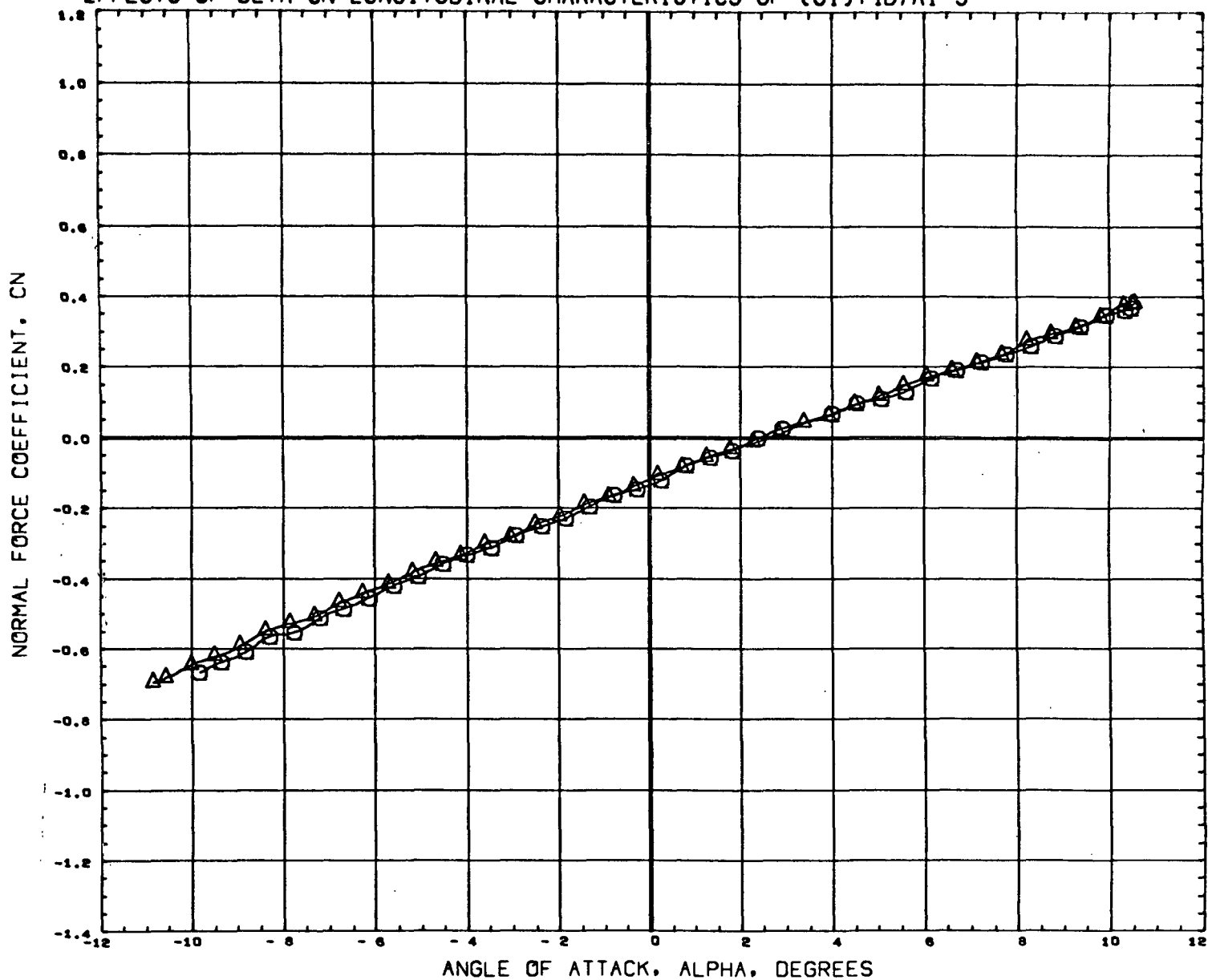
(CD74E4) MDAC S-222 COMPOSITE(T-C6) (01)T4B7A1-5
 (CD74E6) MDAC S-222 COMPOSITE(T-C6) (01)T4B7A1-5

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH .58

PAGE 613

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5

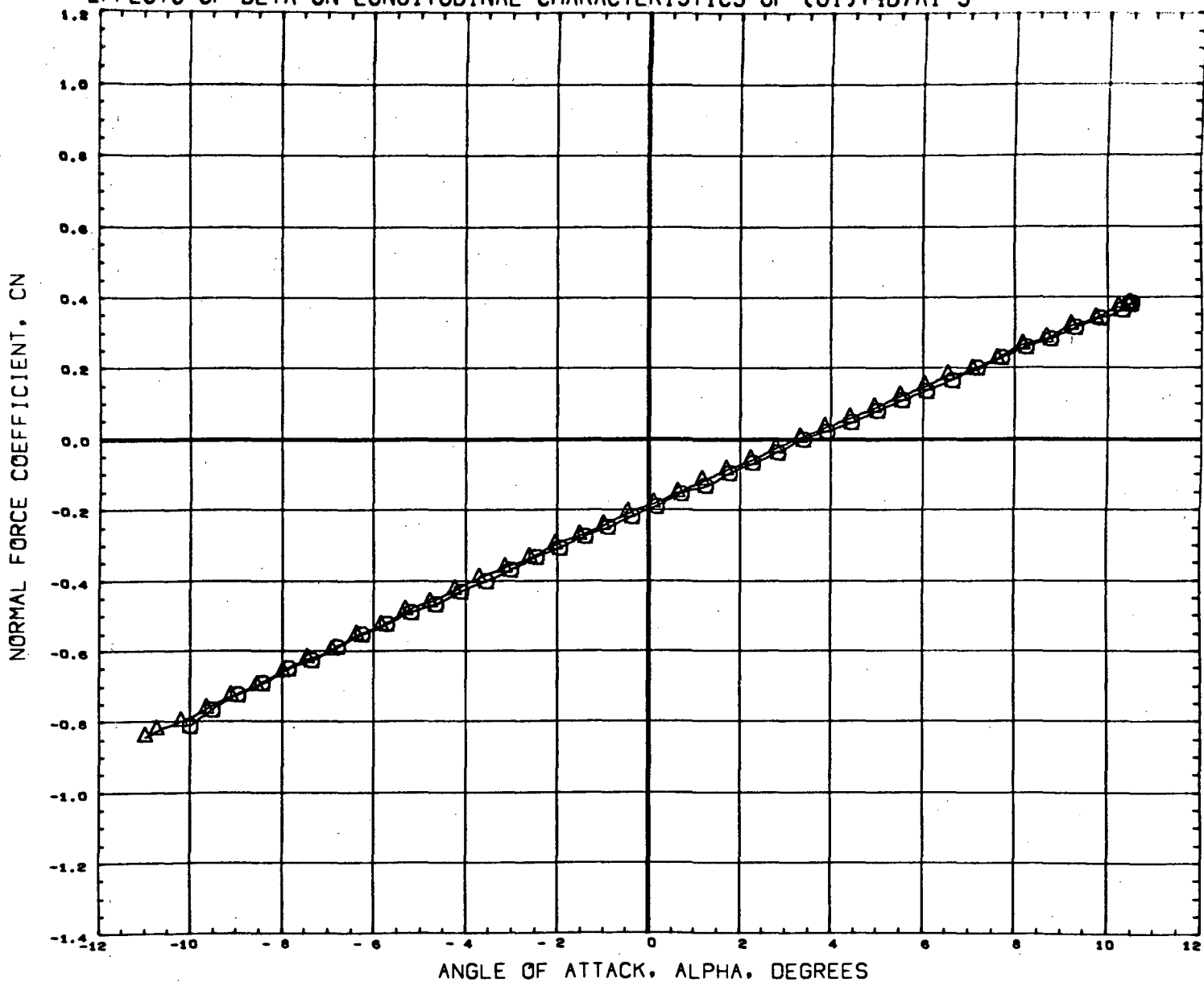


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRRP | 557.0004 IN. |
| | | | | | | YMRRP | 0.0000 IN. |
| | | | | | | ZMRRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

PAGE 614

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



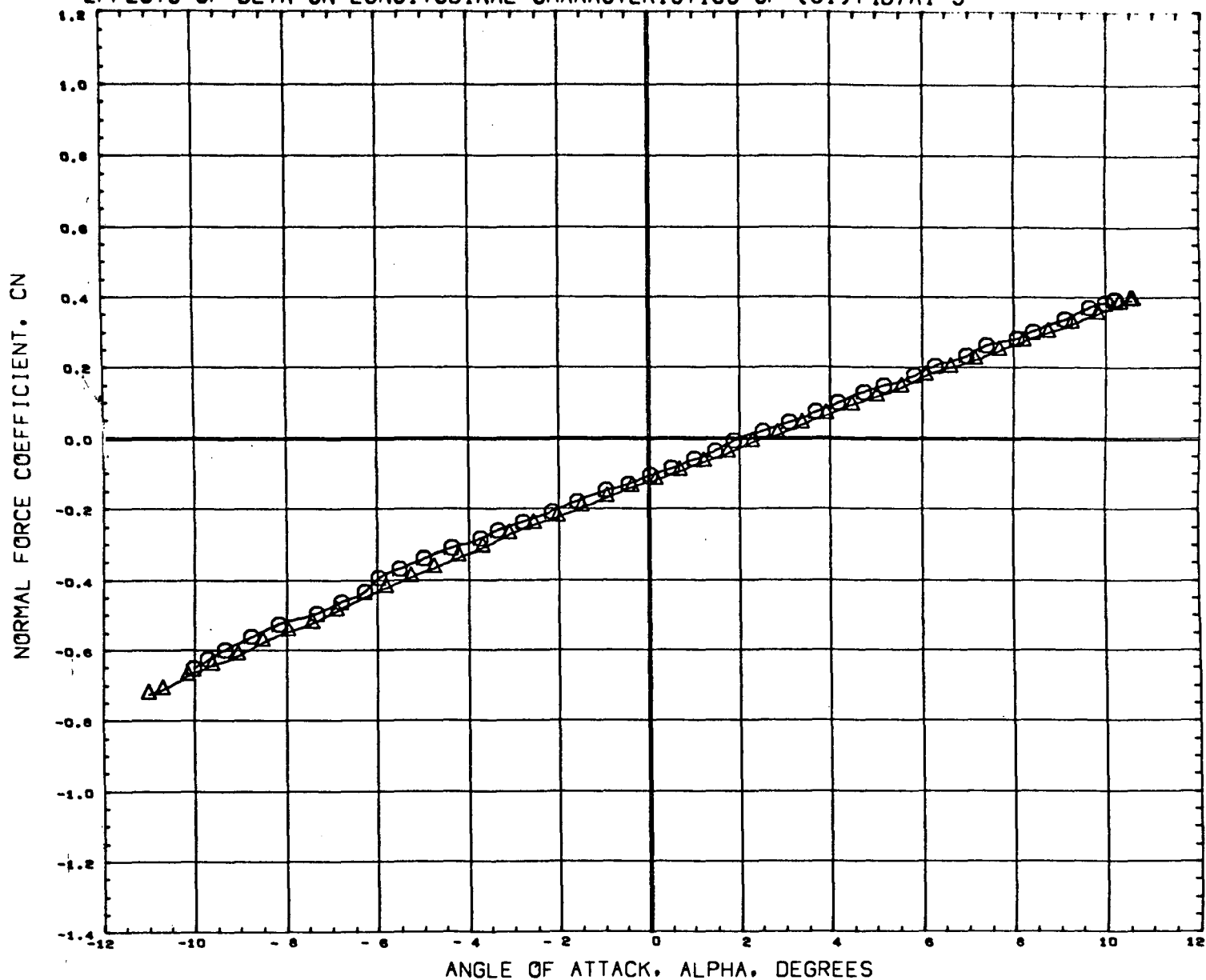
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 |
| (CD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF 3153.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0080 SCALE |

MACH 1.09

PAGE 615

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



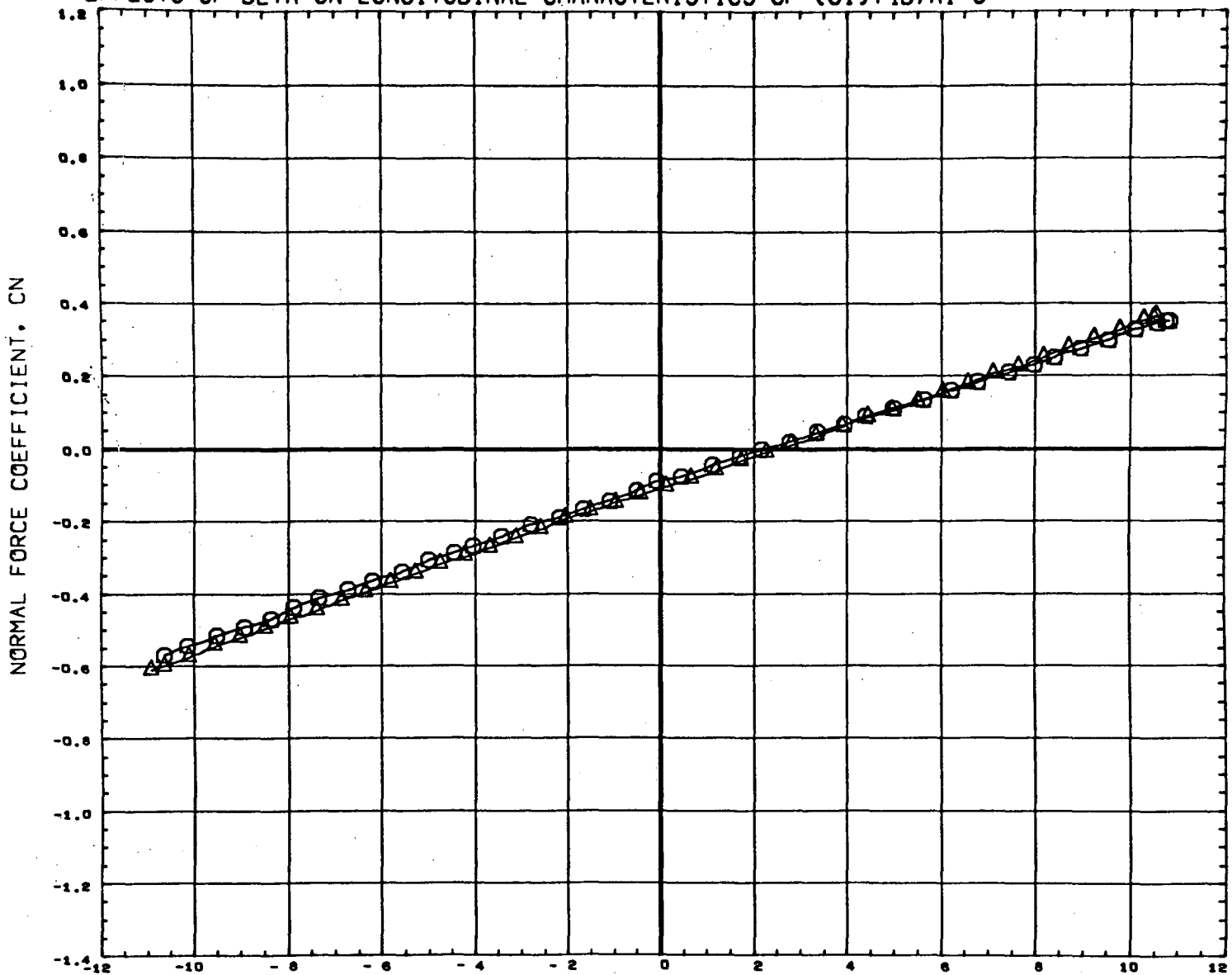
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | NDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | NDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH

1.51

PAGE 616

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5

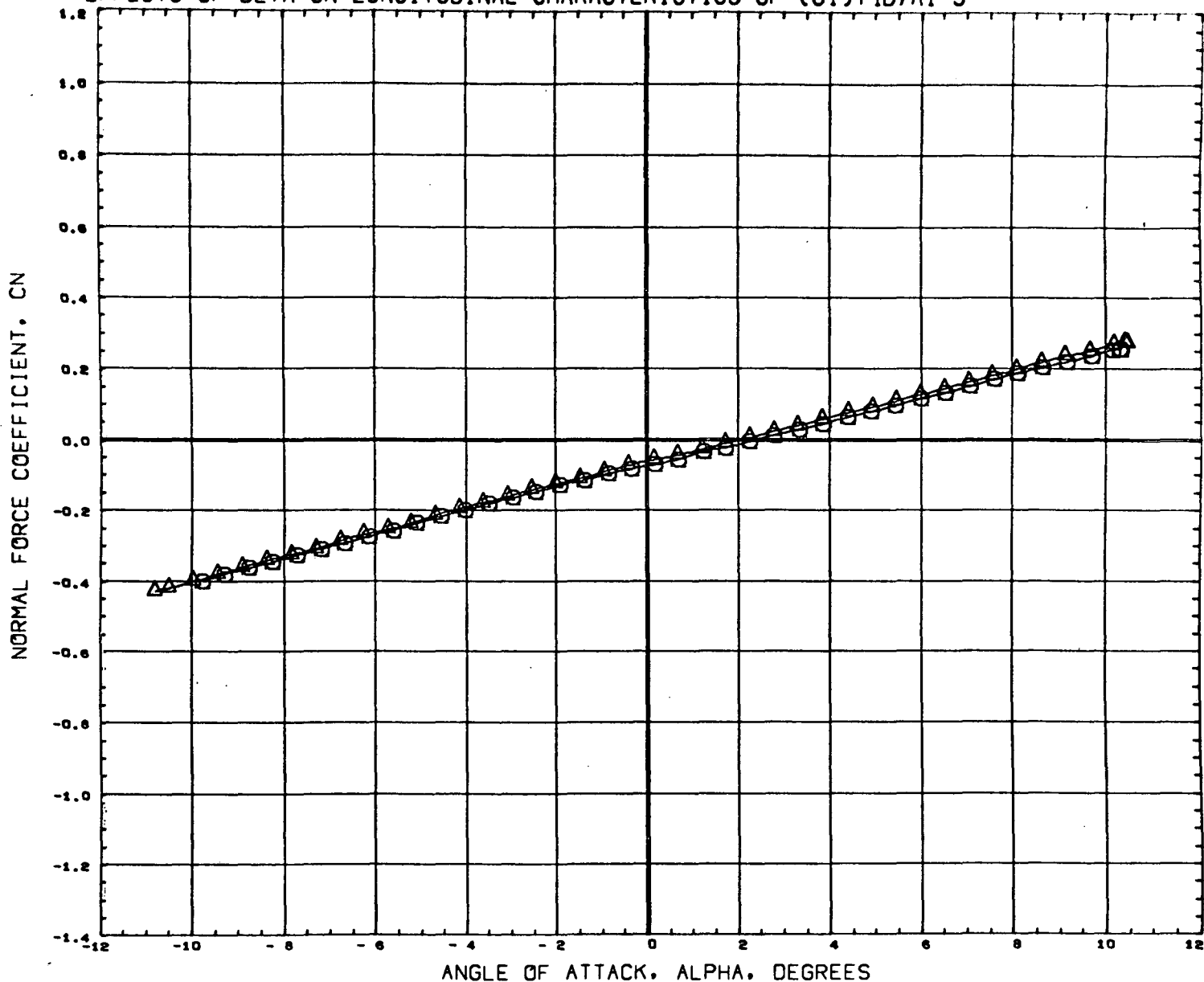


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0080 SCALE |

MACH 2.20

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74E4) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5
 (CD74E6) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

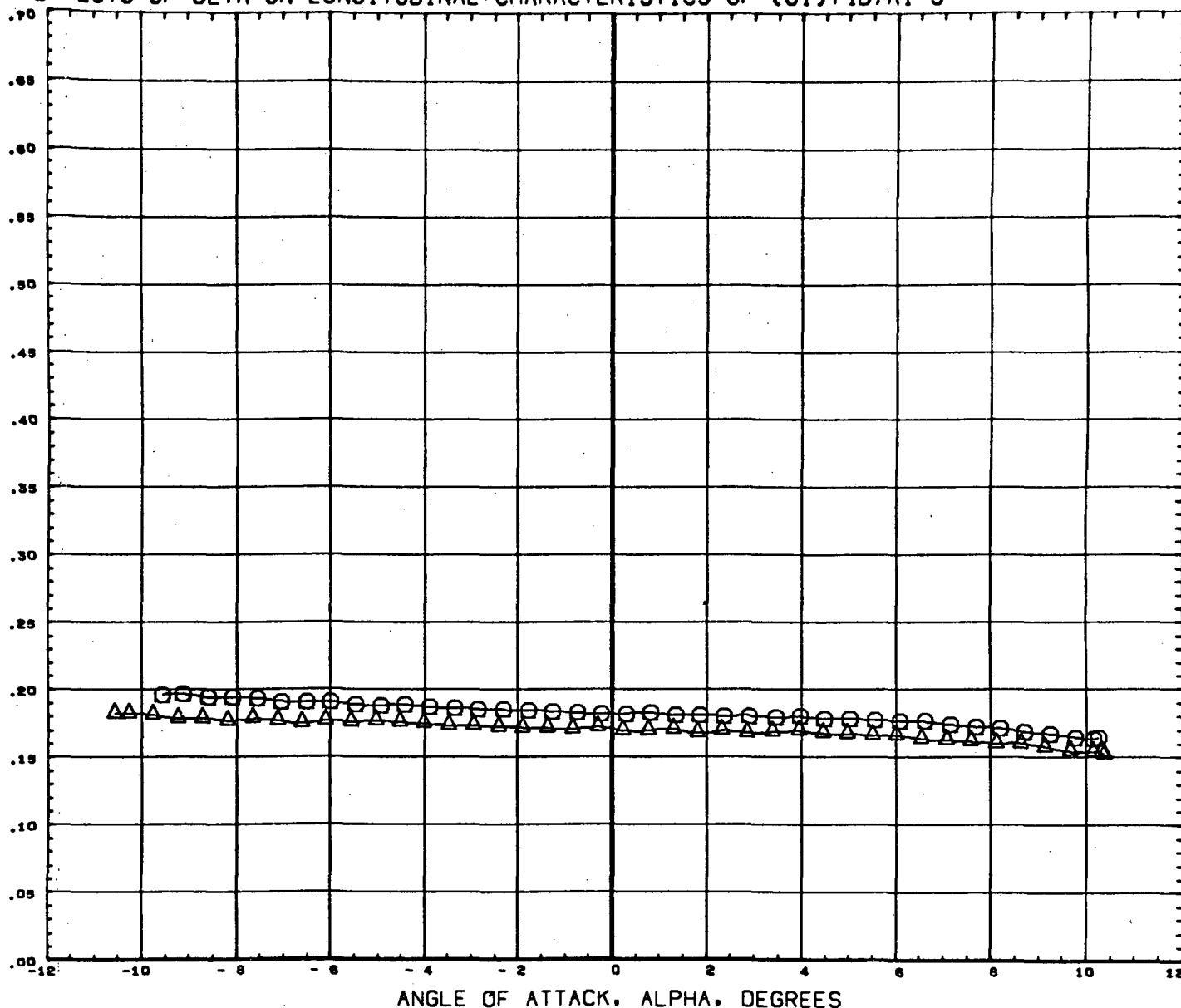
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 4.47

PAGE 618

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-5

AXIAL FORCE COEFFICIENT, CA



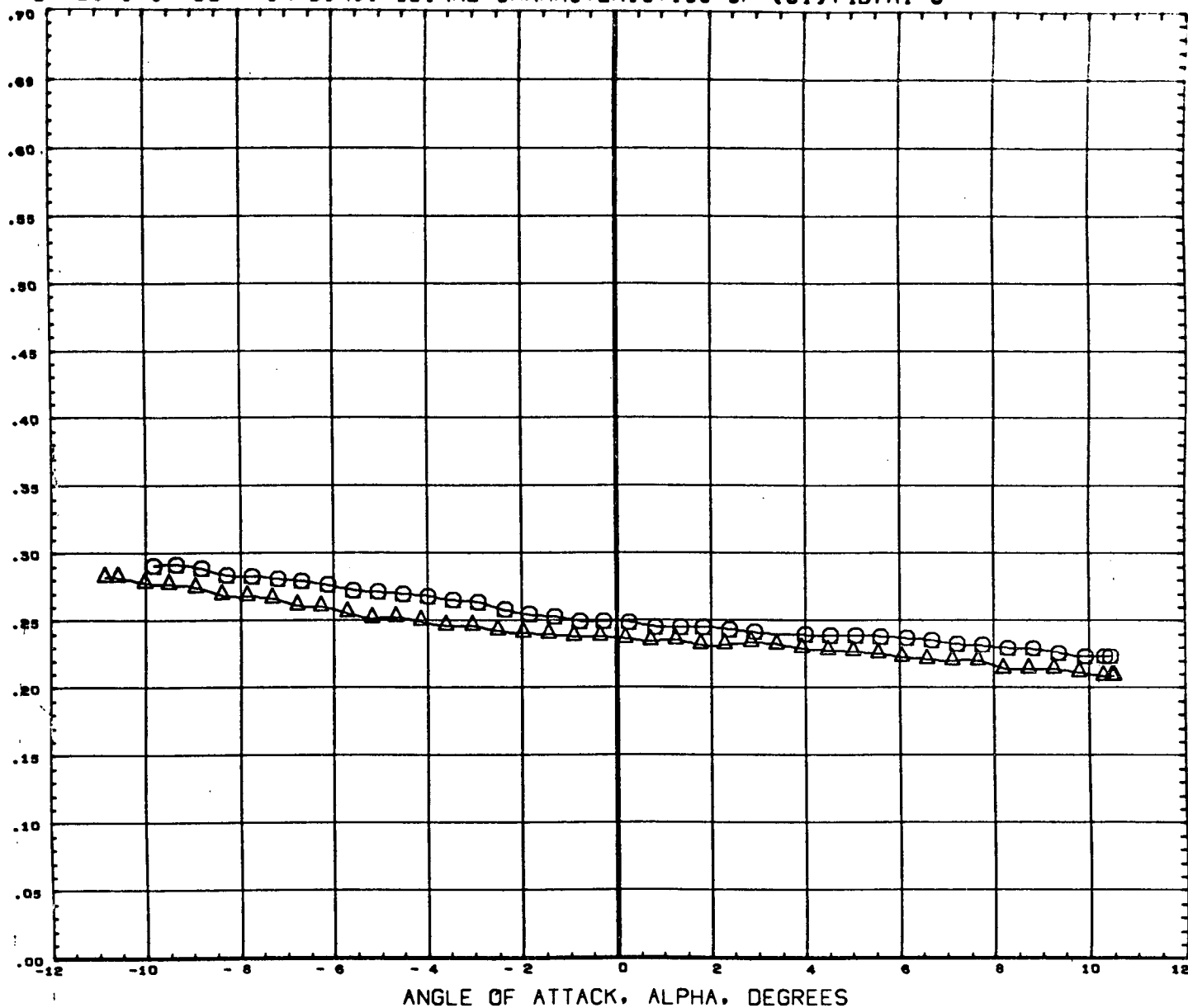
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 682.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58



PAGE 619

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5

AXIAL FORCE COEFFICIENT, CA



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74E4)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5
 (CD74E6)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

REFERENCE INFORMATION

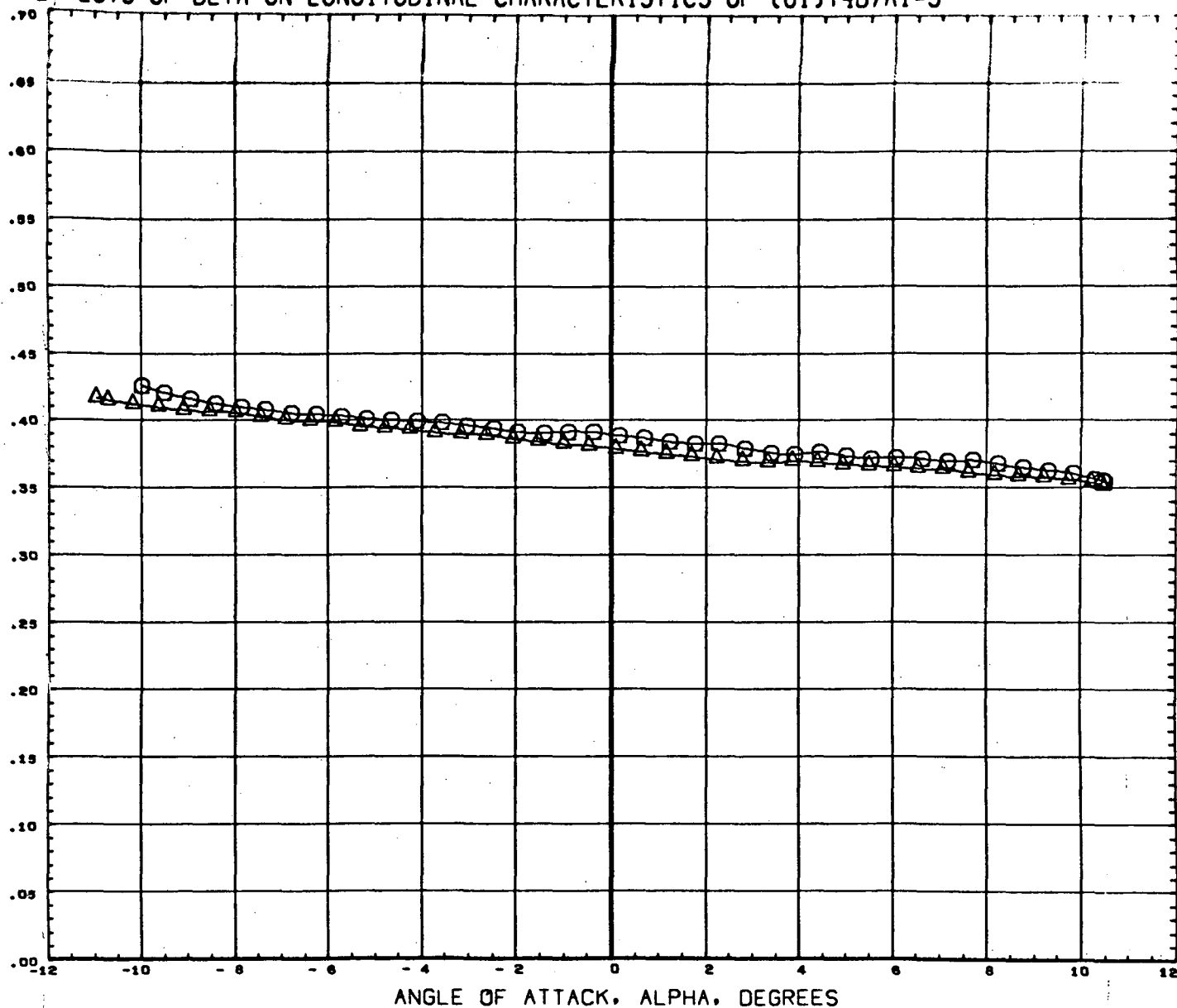
| | | |
|-------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 862.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH .90

PAGE 620

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5

AXIAL FORCE COEFFICIENT, CA



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74E4) (01)T4B7A1-5
(CD74E6) (01)T4B7A1-5

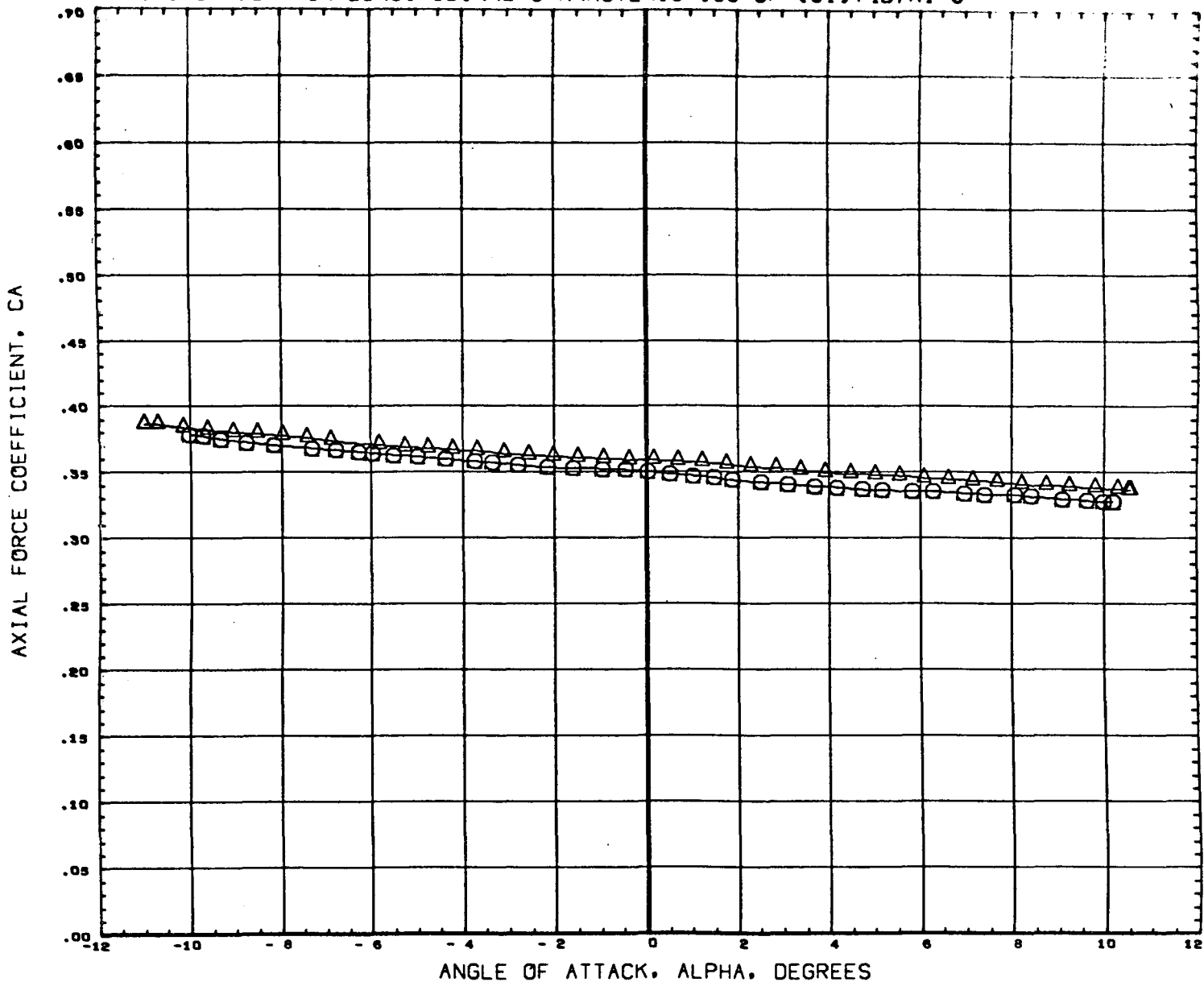
BETA ELEVTR AILRON RUDDER
0.000 0.000 0.000 0.000
6.000 0.000 0.000 0.000

REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.3004 IN.
BREF 662.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060 SCALE


MACH 1.09


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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74E4)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5

(CD74E6)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

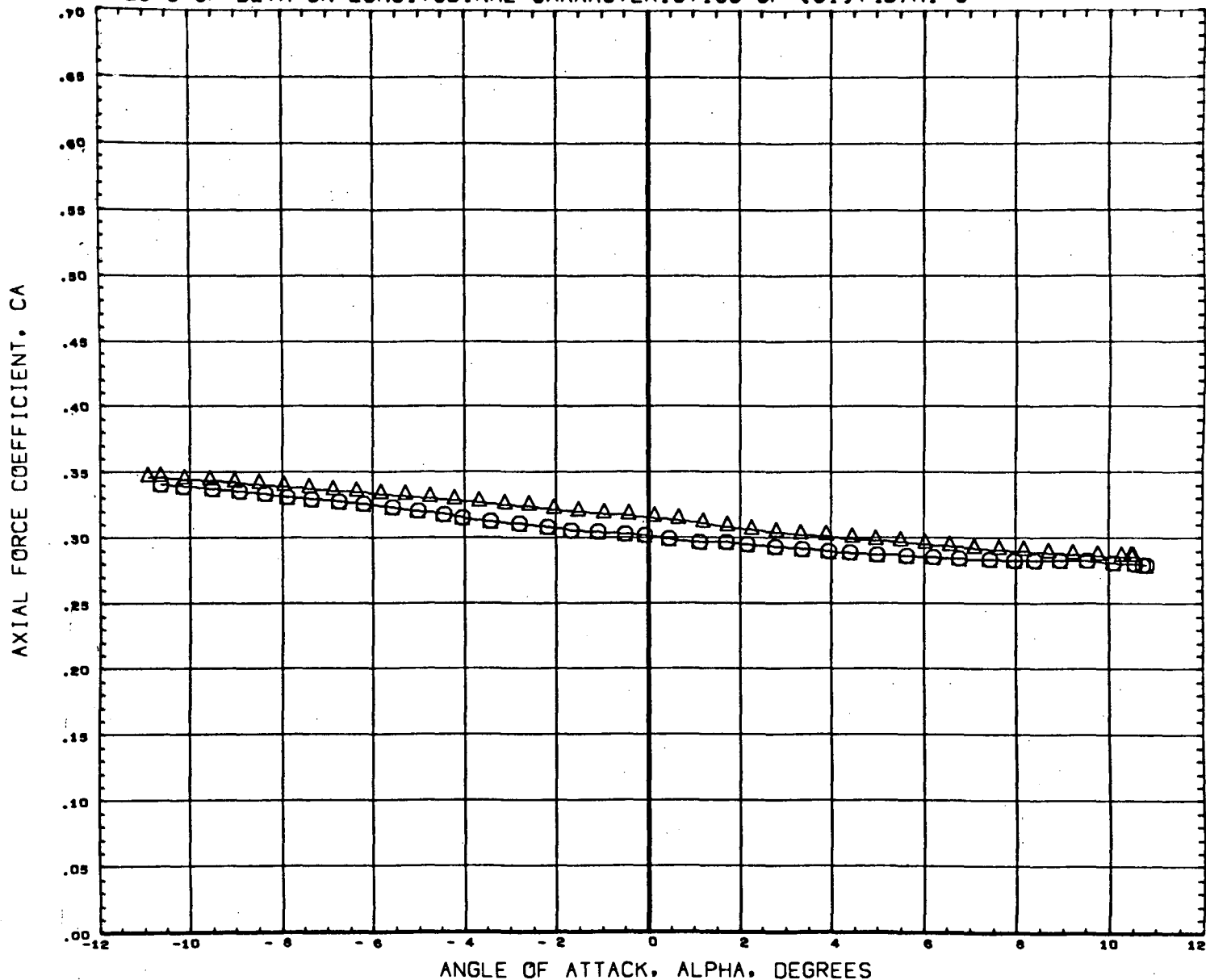
| REFERENCE INFORMATION | |
|-----------------------|------------------|
| SREF | 3155.3040 52.FT. |
| LREF | 609.5004 IN. |
| BREF | 882.0004 IN. |
| XMRP | 557.0004 IN. |
| YMRP | 0.0000 IN. |
| ZMRP | 200.0004 IN. |
| SCALE | 0.0060 SCALE |

MACH

1.51

PAGE 622

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5

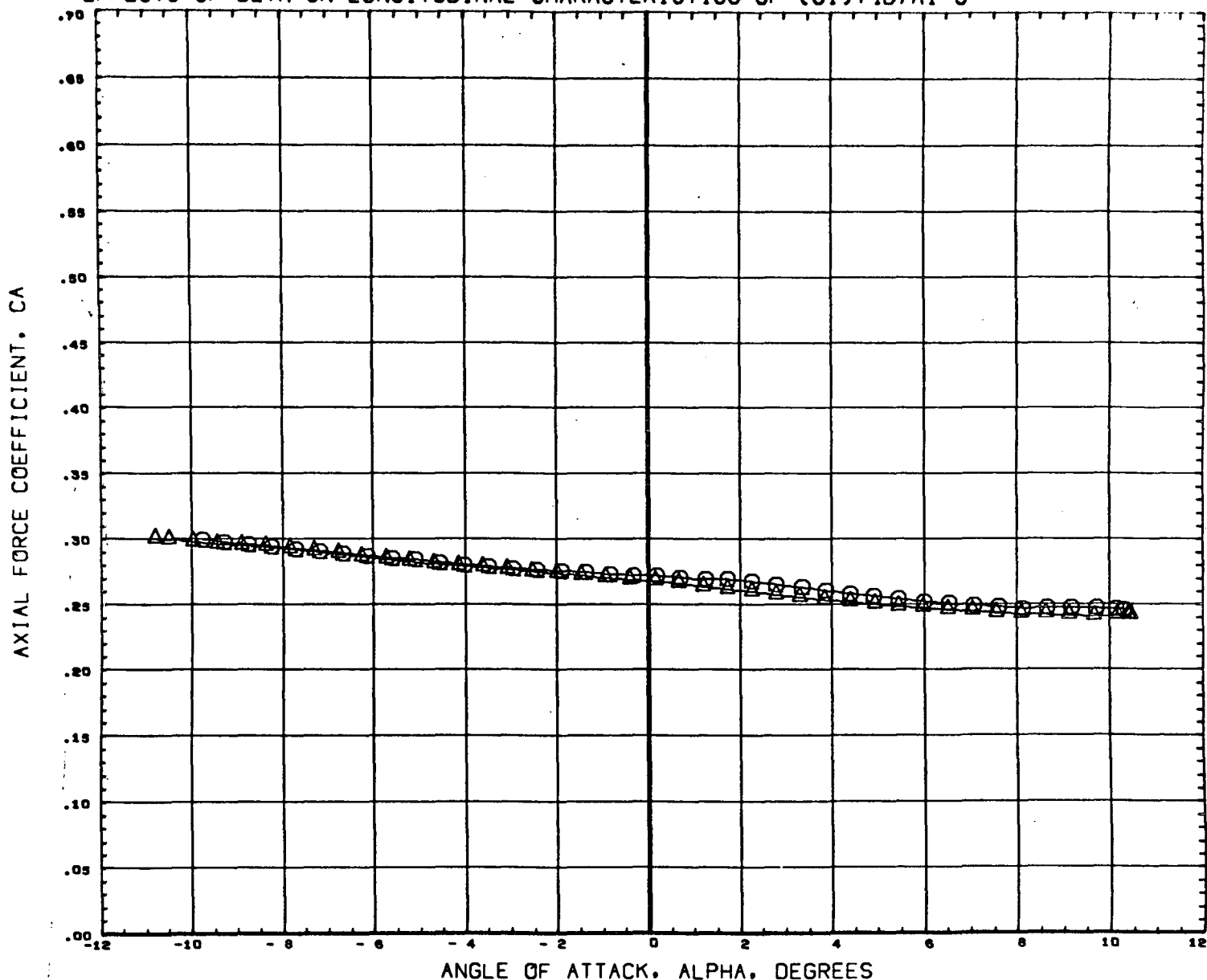


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



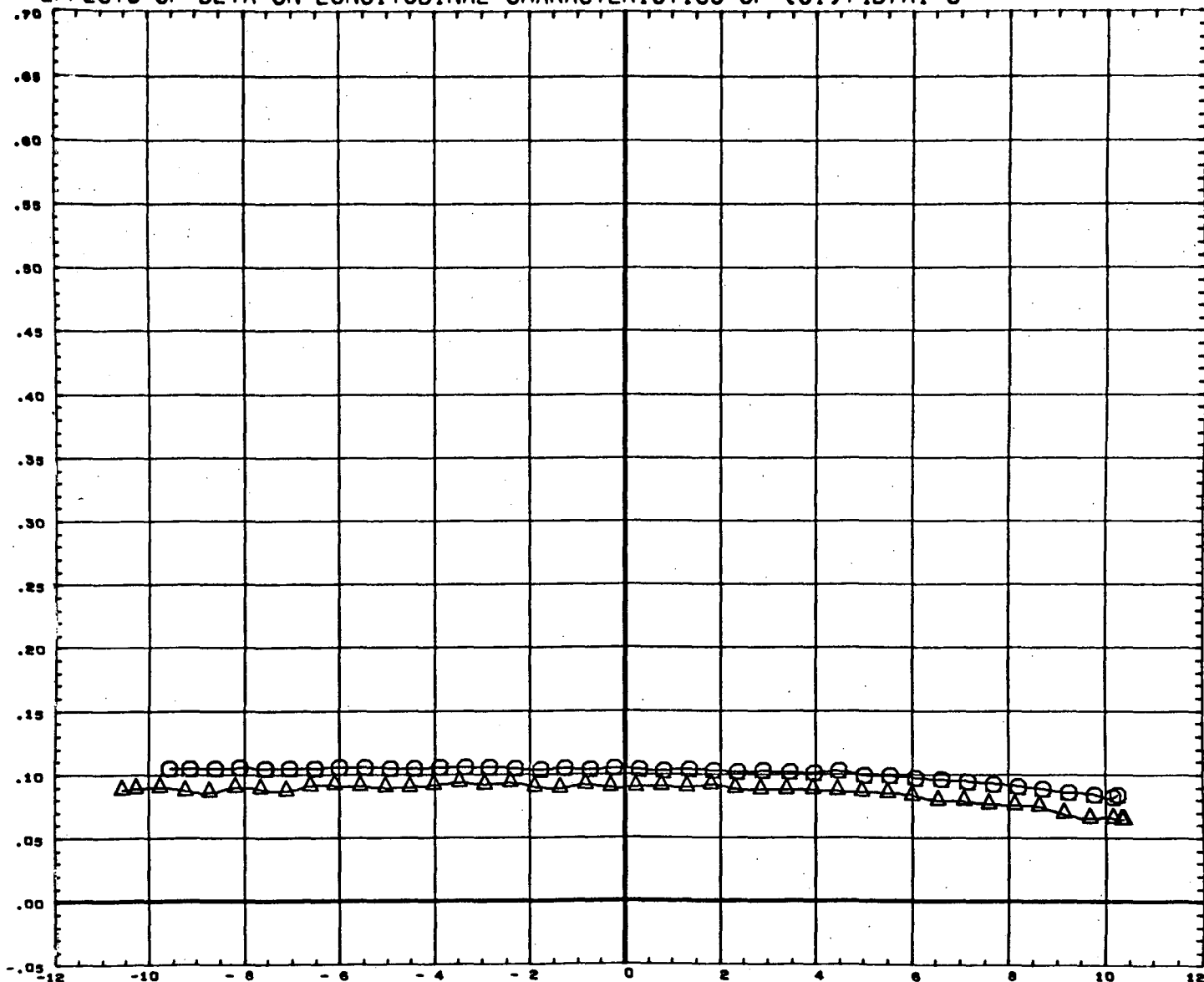
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5

FOREBODY AXIAL FORCE COEFFICIENT, CAF



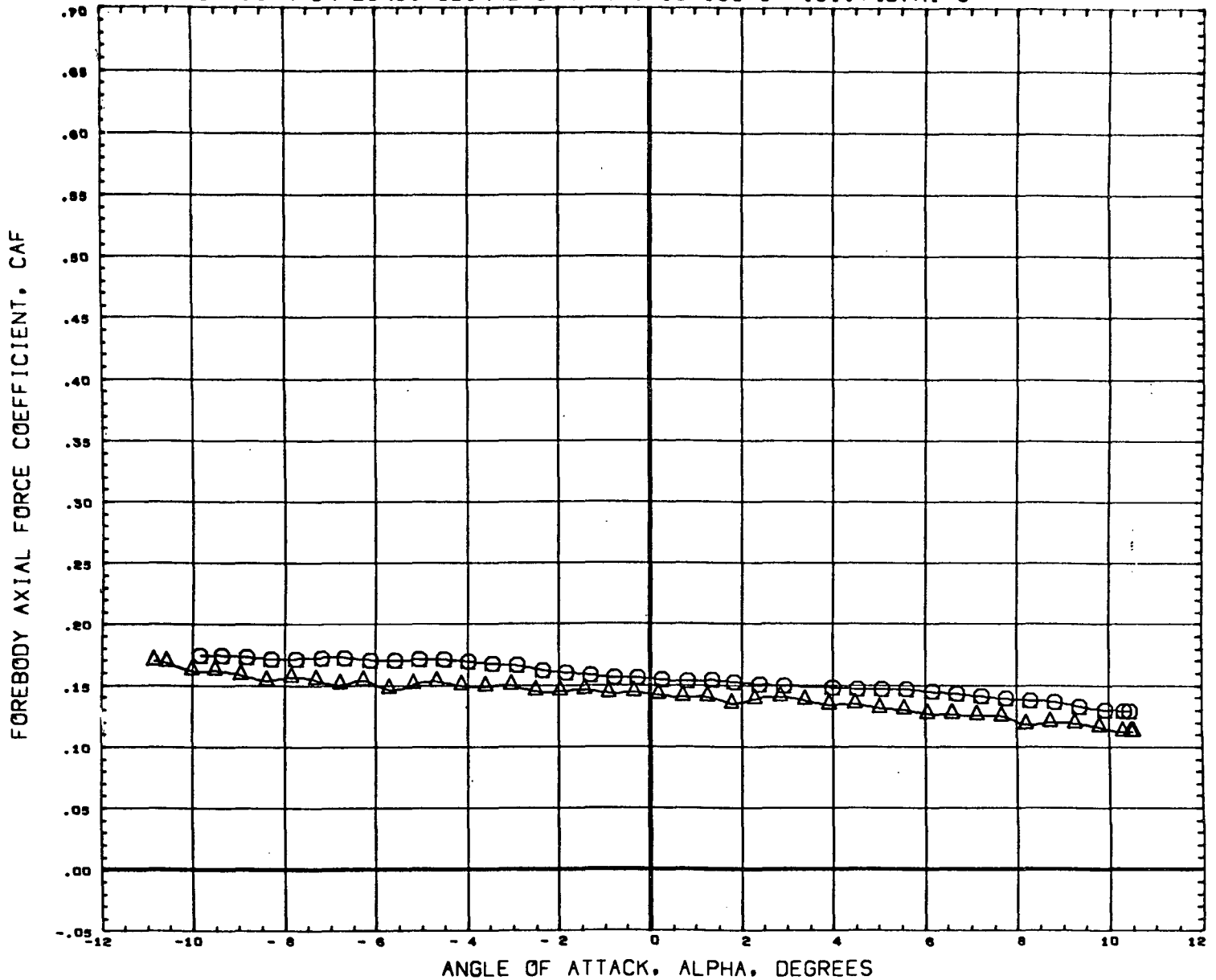
ANGLE OF ATTACK, ALPHA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.9004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



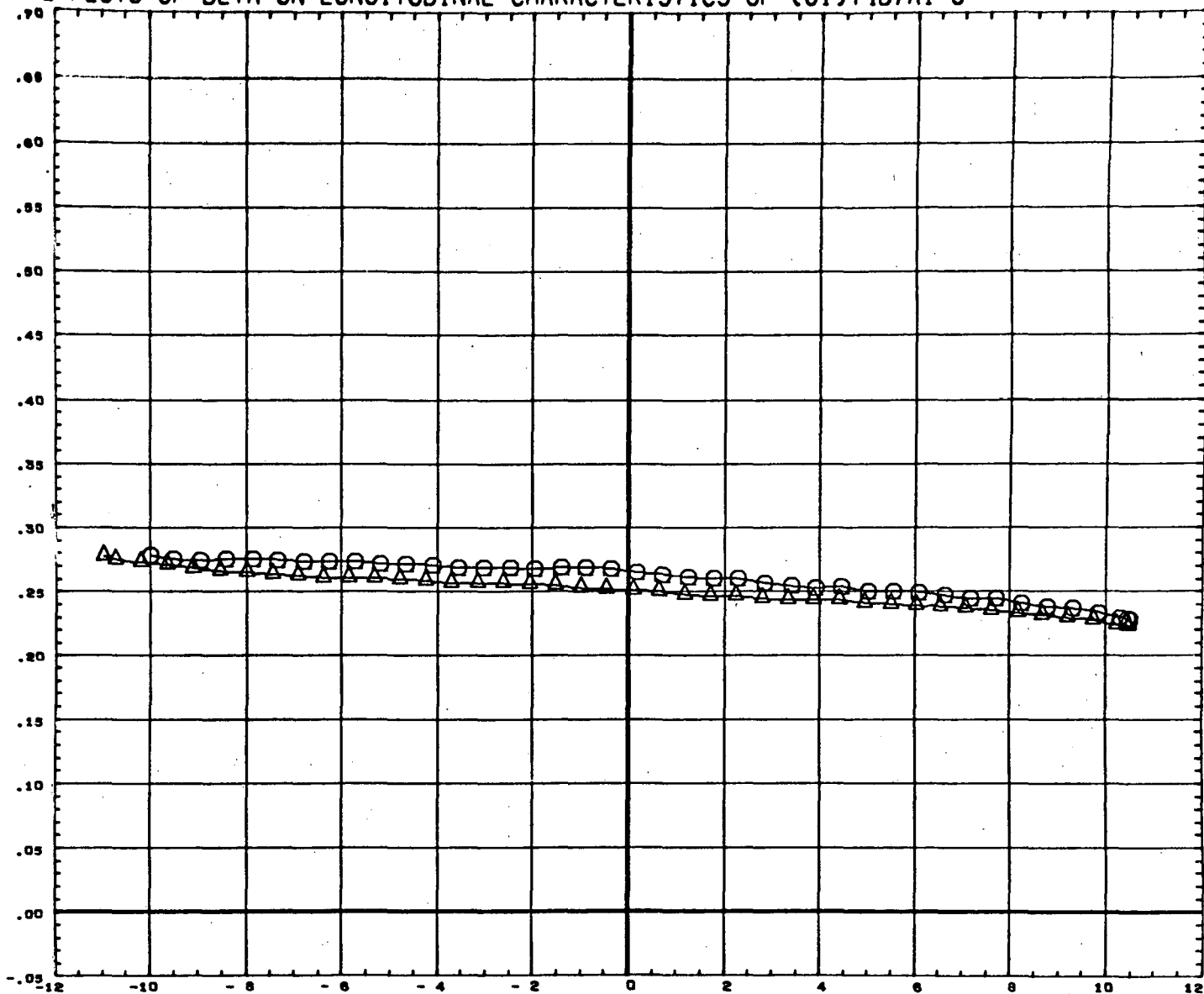
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.9004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 957.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

PAGE 626

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-5

FOREBODY AXIAL FORCE COEFFICIENT, CAF



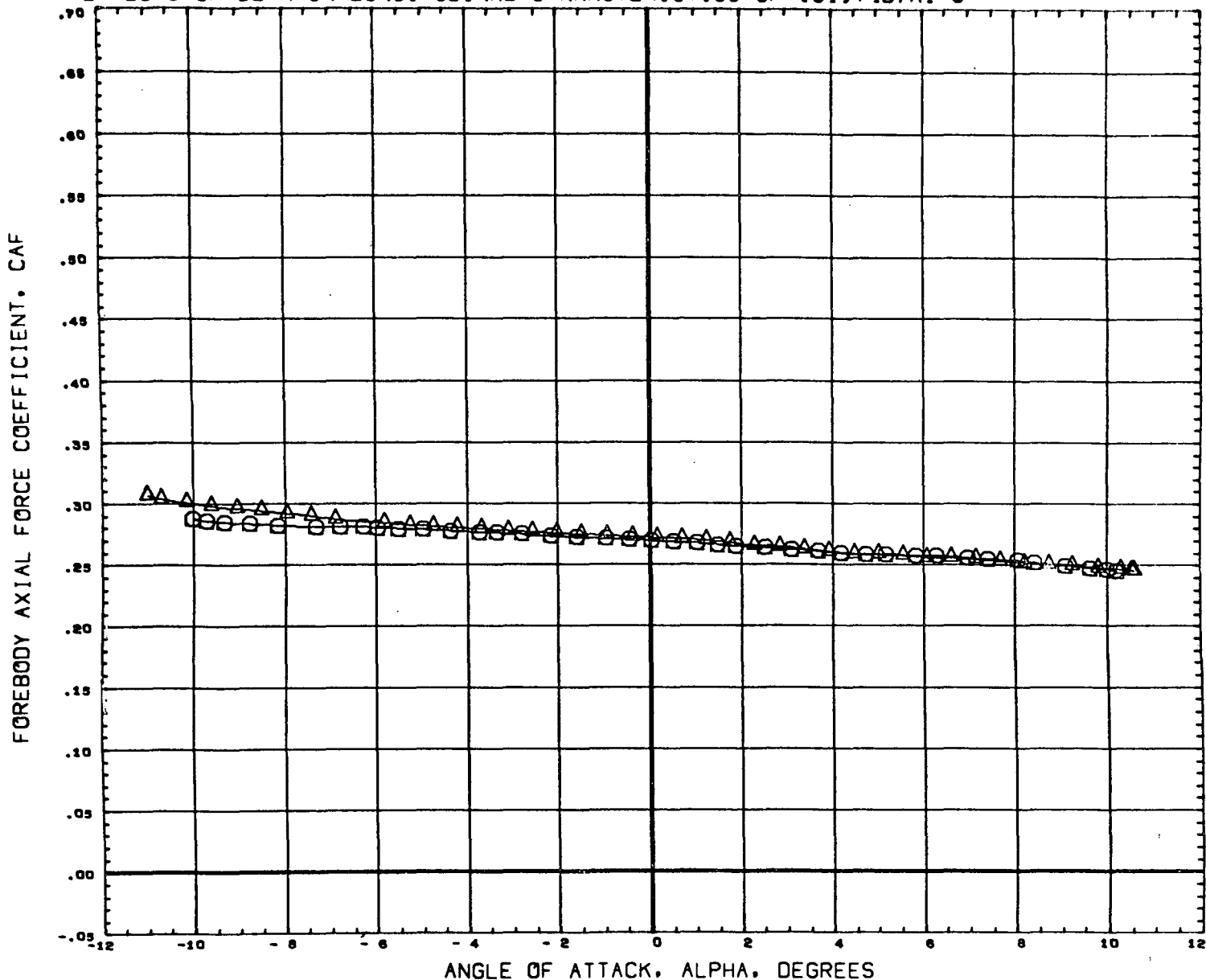
ANGLE OF ATTACK, ALPHA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | SREF | 662.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.09

PAGE 627

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



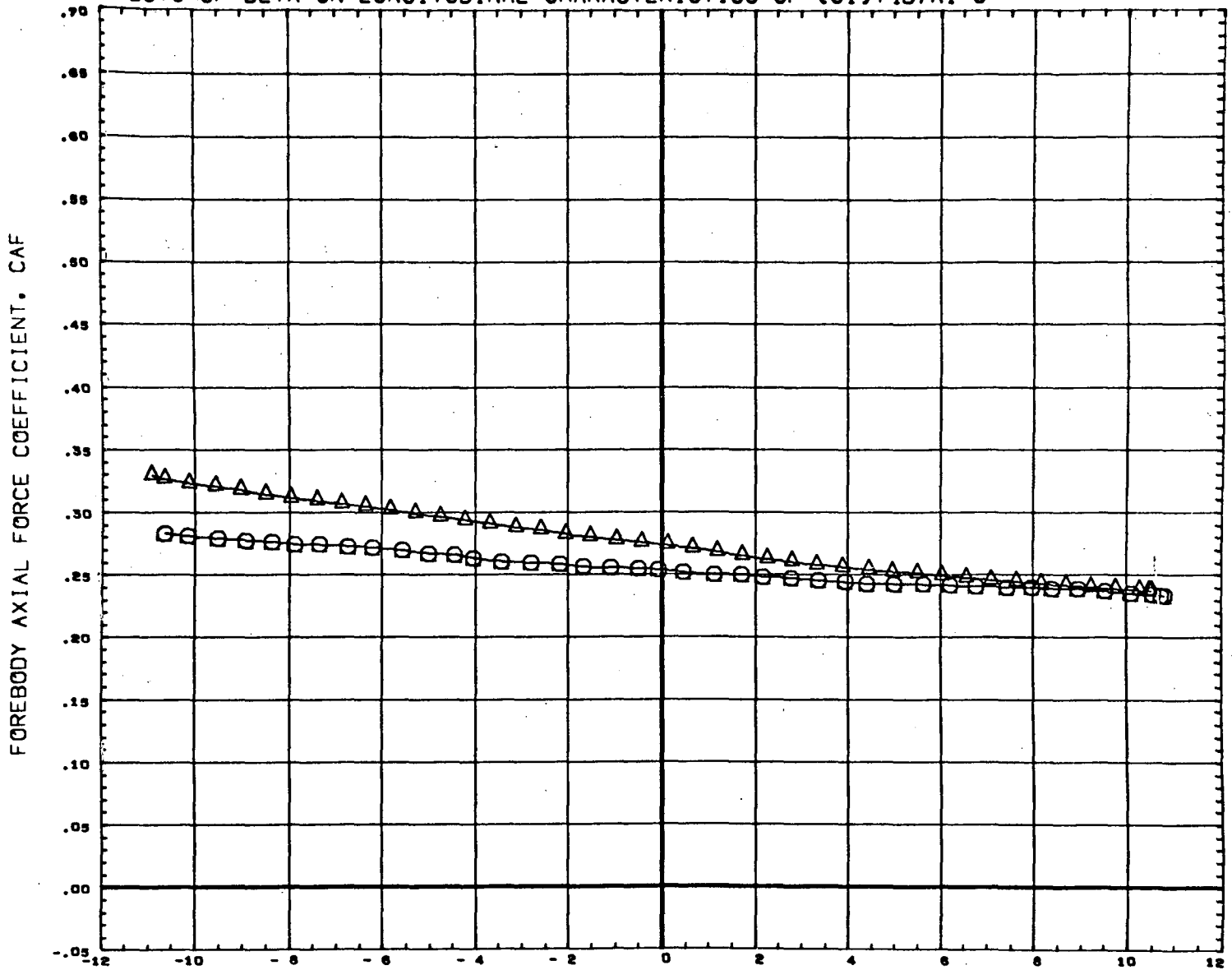
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE(T-C6) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE(T-C6) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 957.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH

1.51

PAGE 628

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



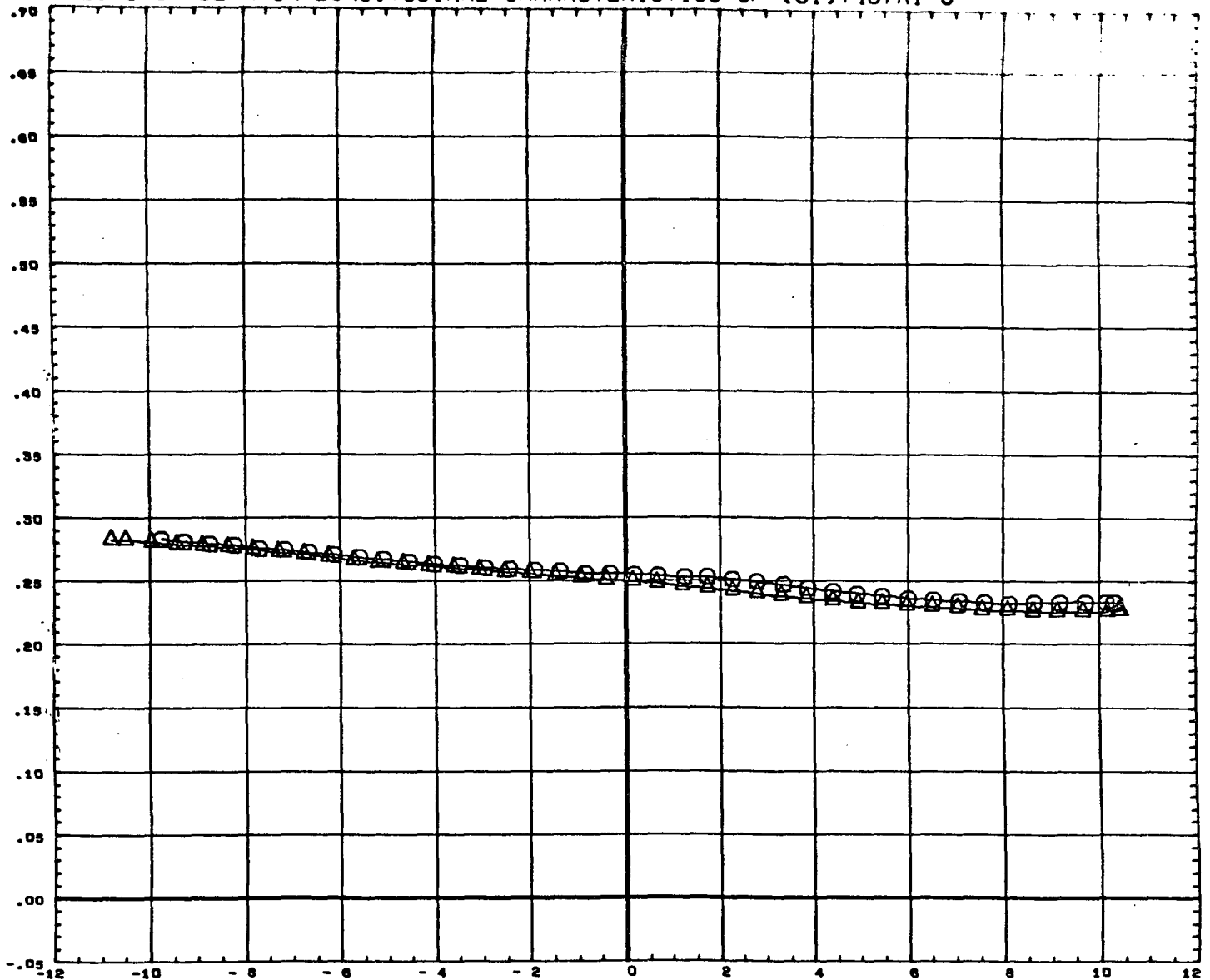
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 682.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5

FOREBODY AXIAL FORCE COEFFICIENT, CAF



ANGLE OF ATTACK, ALPHA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XHRP | 557.0004 IN. |
| | | | | | | YHRP | 0.0000 IN. |
| | | | | | | ZHRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

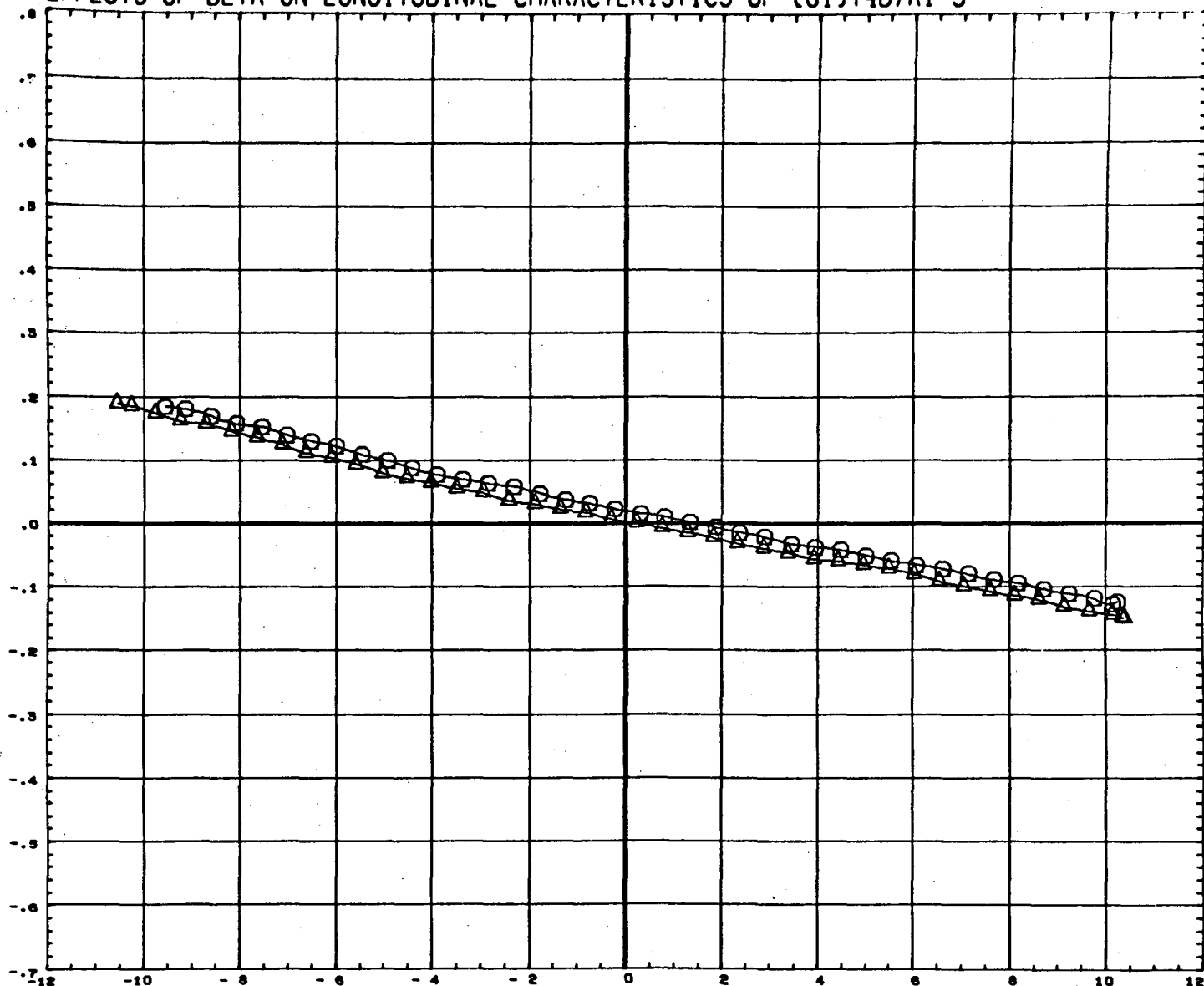
MACH

4.47

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5

PITCHING MOMENT COEFFICIENT, CLM

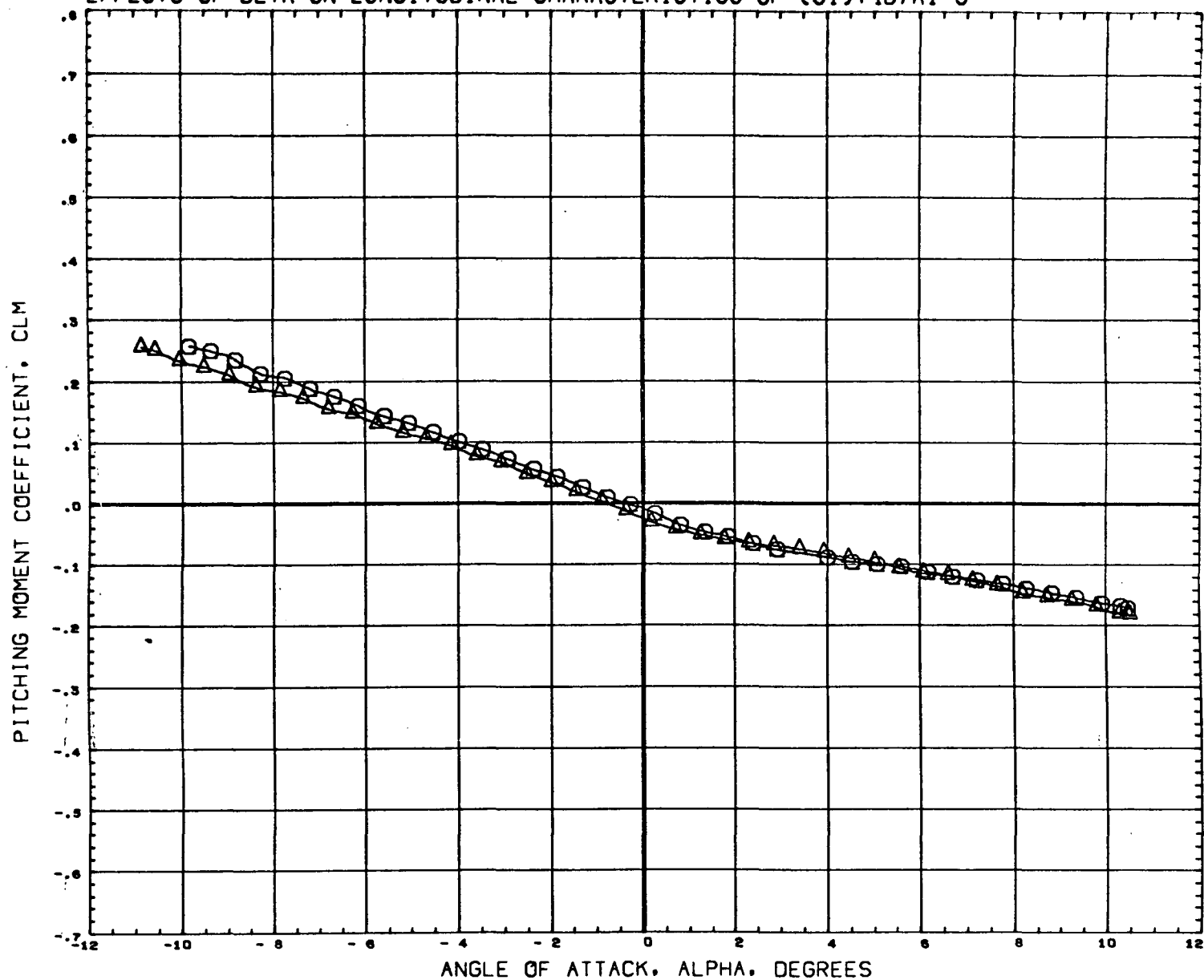


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74E4) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5
 (CD74E6) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

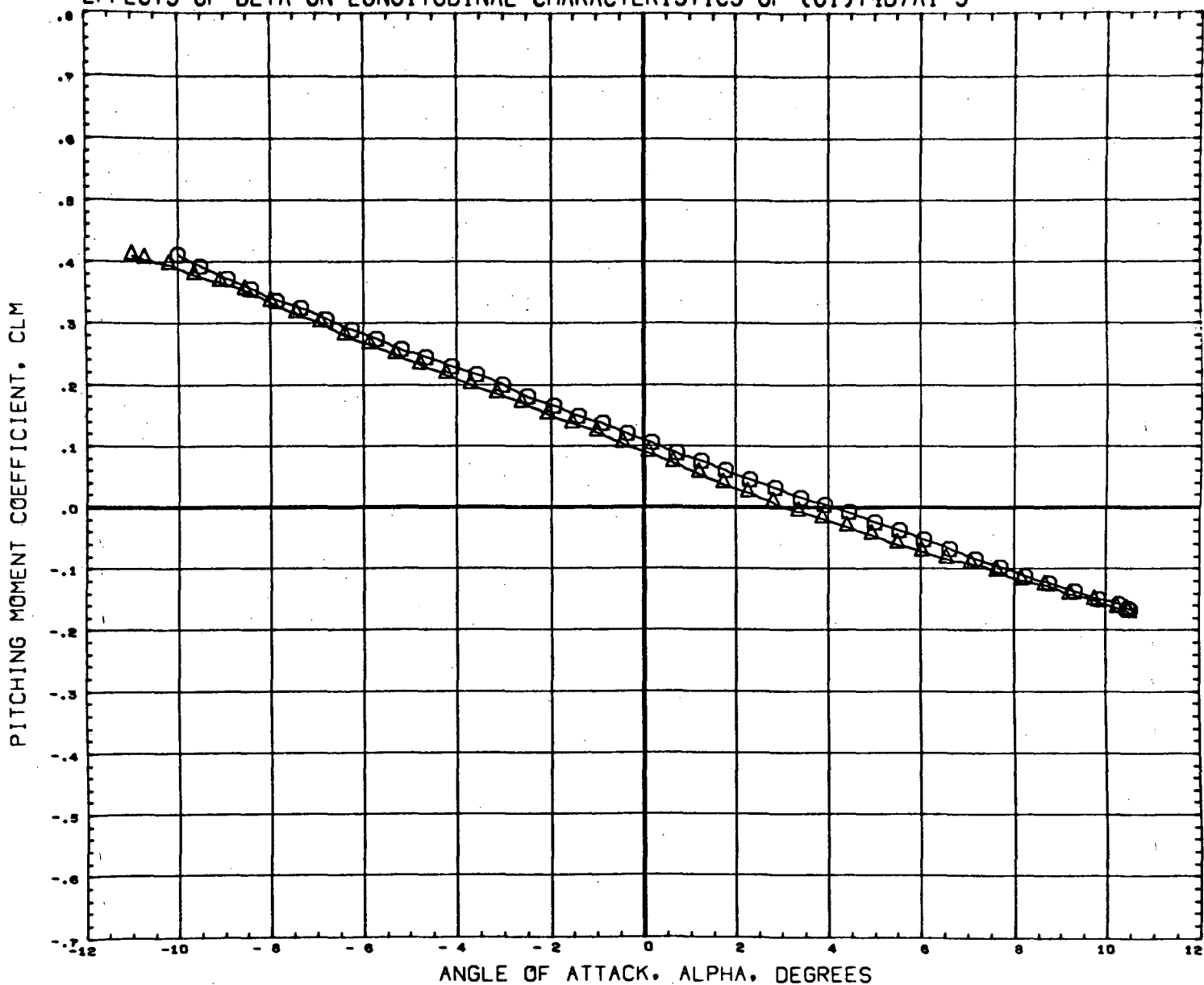
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | |
|-----------------------|------------------|
| SREF | 3155.3040 SQ.FT. |
| LREF | 609.5004 IN. |
| BREF | 882.0004 IN. |
| XMRP | 557.0004 IN. |
| YMRP | 0.0000 IN. |
| ZMRP | 200.0004 IN. |
| SCALE | 0.0060 SCALE |


MACH .90


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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74E4)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5

(CD74E6)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5

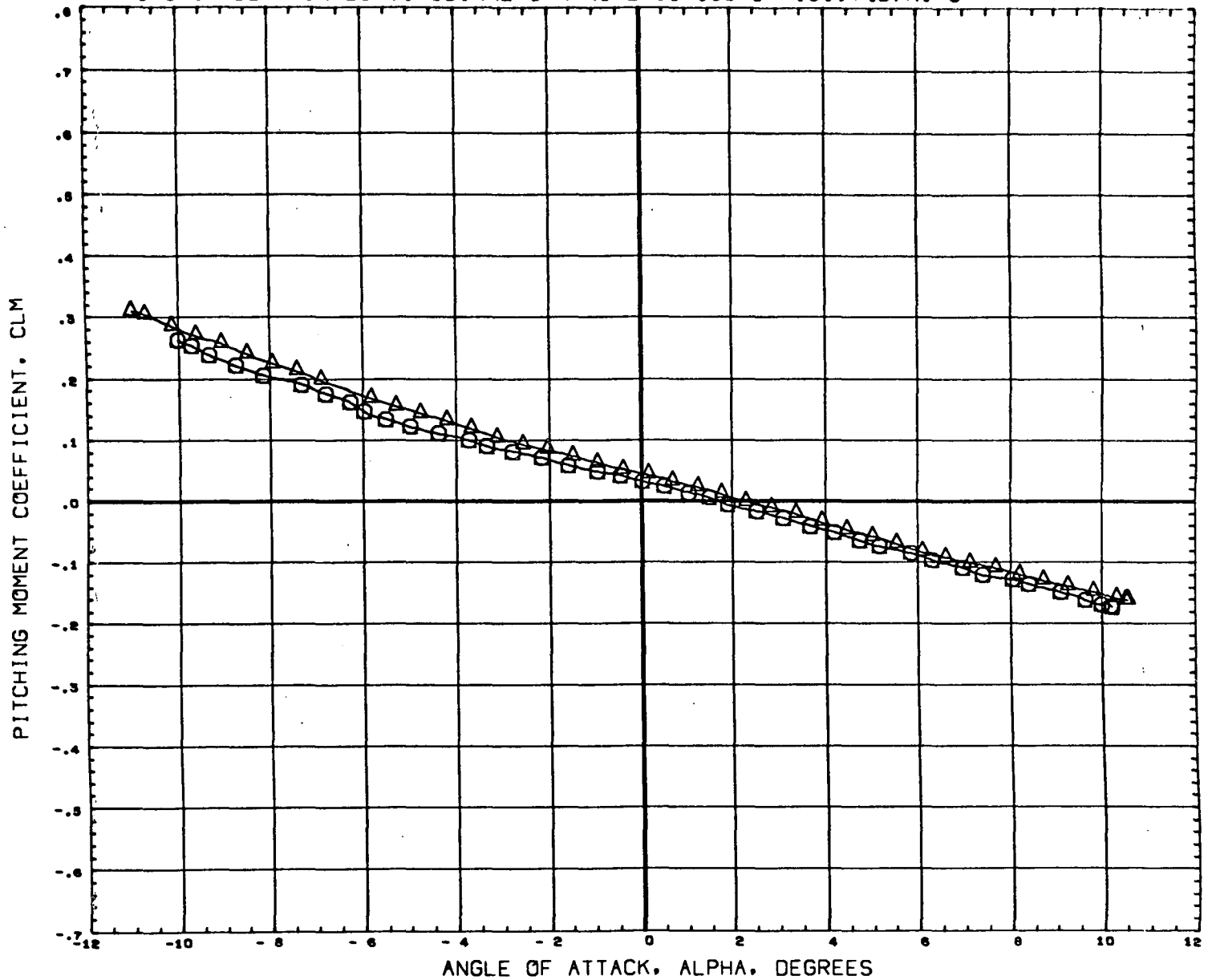
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | |
|-----------------------|------------------|
| SREF | 3155.3040 SQ.FT. |
| LREF | 609.5004 IN. |
| BREF | 882.0004 IN. |
| XMRP | 557.0004 IN. |
| YMRP | 0.0000 IN. |
| ZMRP | 200.0004 IN. |
| SCALE | 0.0060 SCALE |

MACH 1.09

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-5



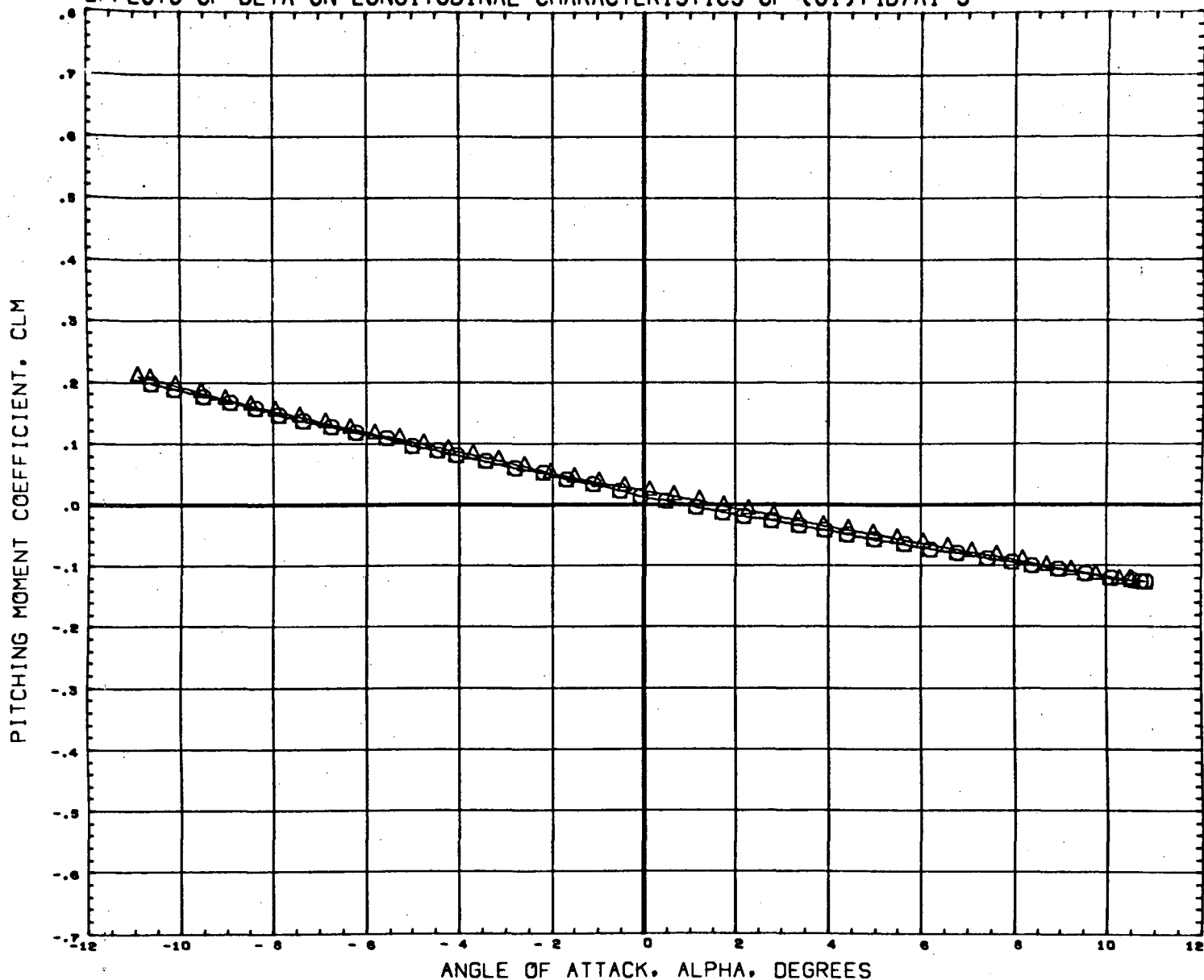
DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74E4) ○ MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-5
 (CD74E6) △ MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-5

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 1.51

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74E4) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5
 (CD74E6) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

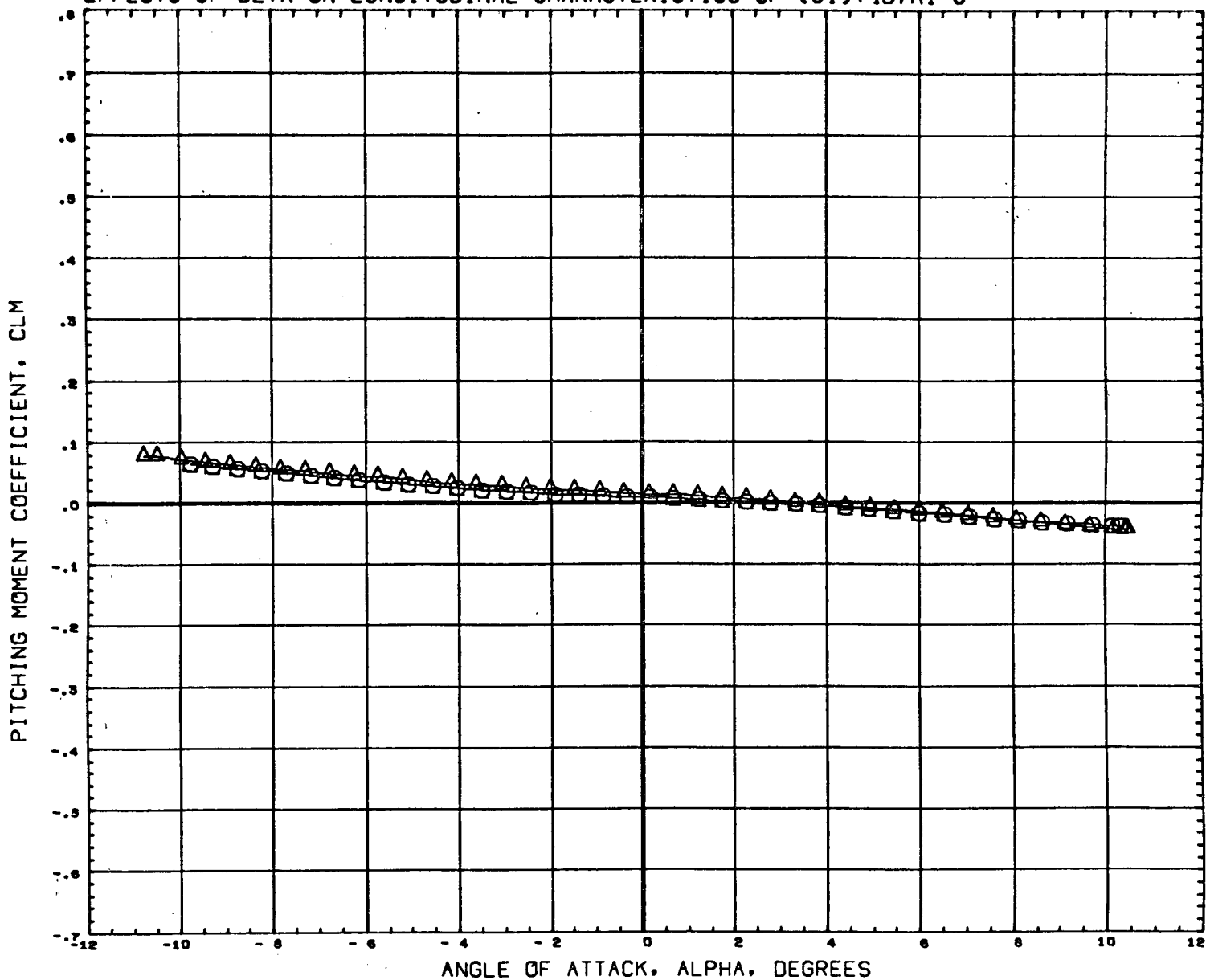
BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 6.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH 2.20

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-5

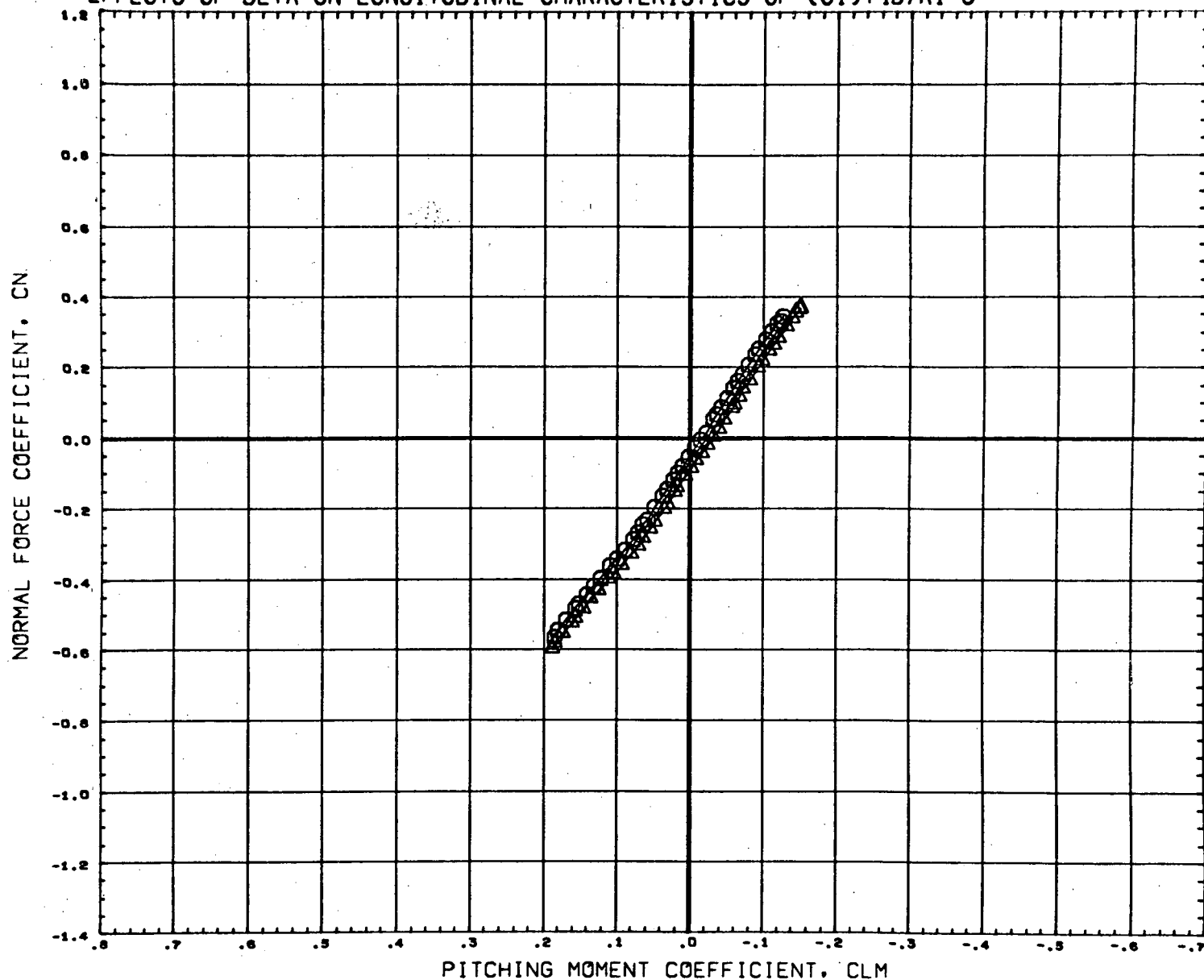


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5

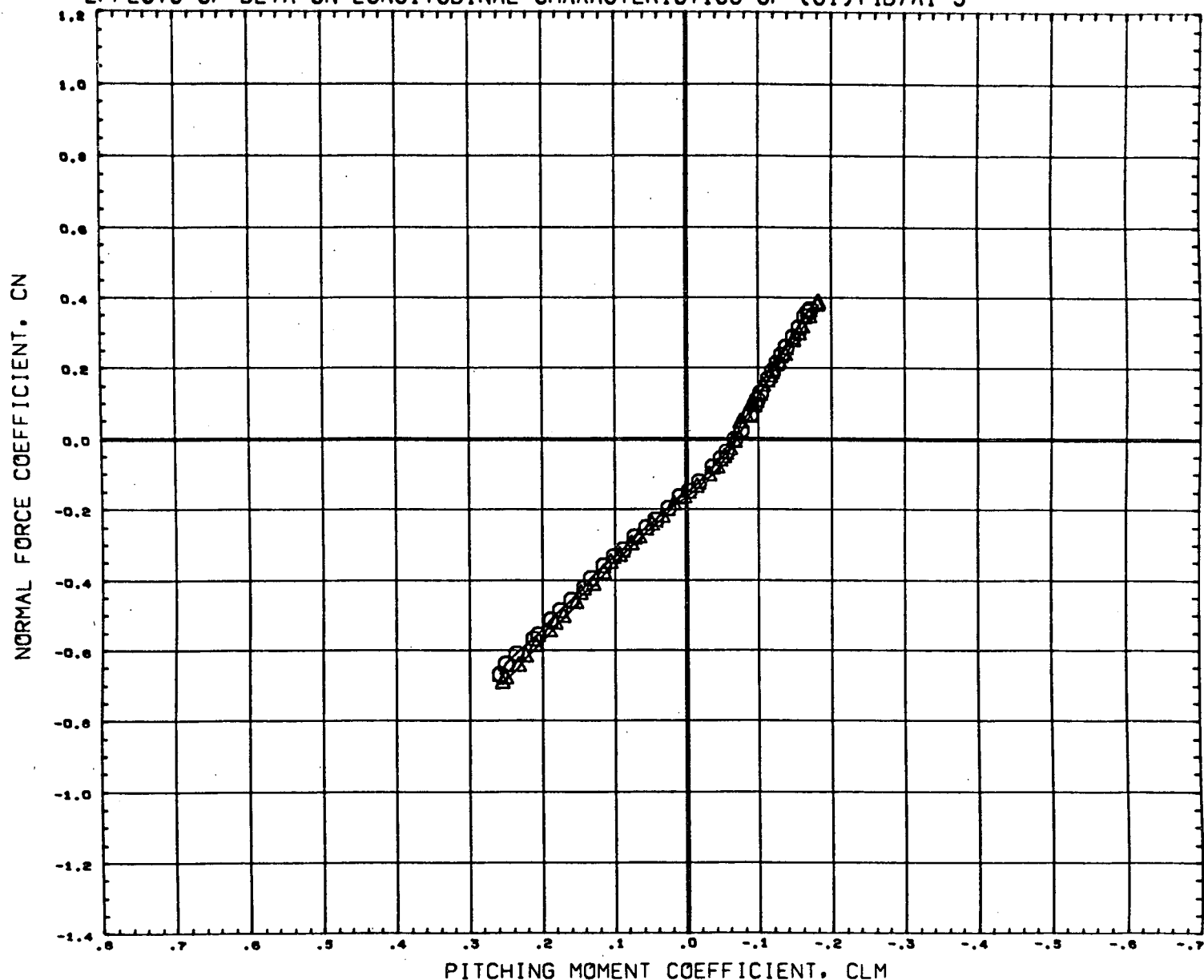


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 662.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

PAGE 637

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74E4) MDAC S-222 COMPOSITE(T-C6) (01)T4B7A1-5
 (CD74E6) MDAC S-222 COMPOSITE(T-C6) (01)T4B7A1-5

BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 6.000 0.000 0.000 0.000

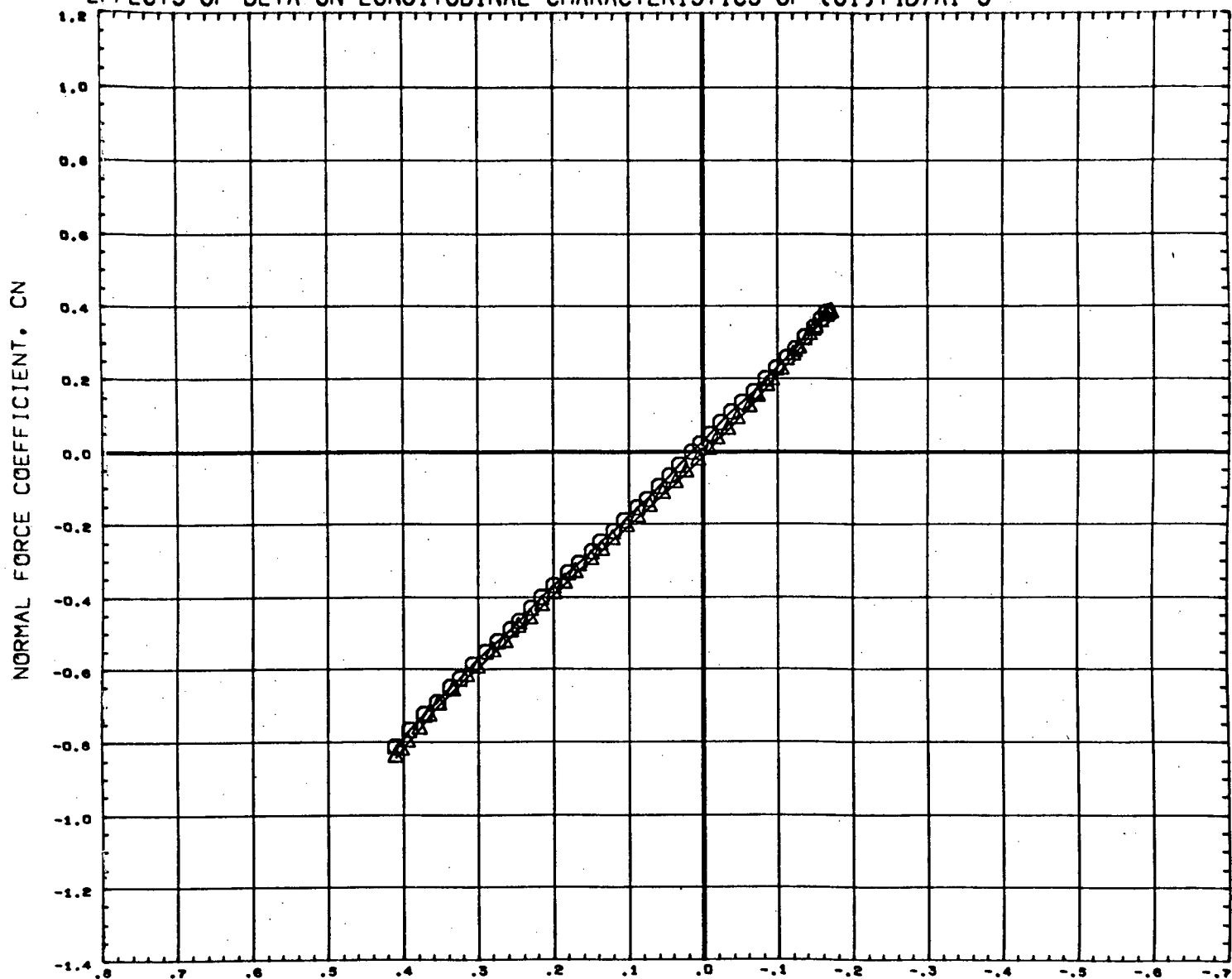
REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH

.90

PAGE 638

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74E4) (0) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5
 (CD74E6) (1) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

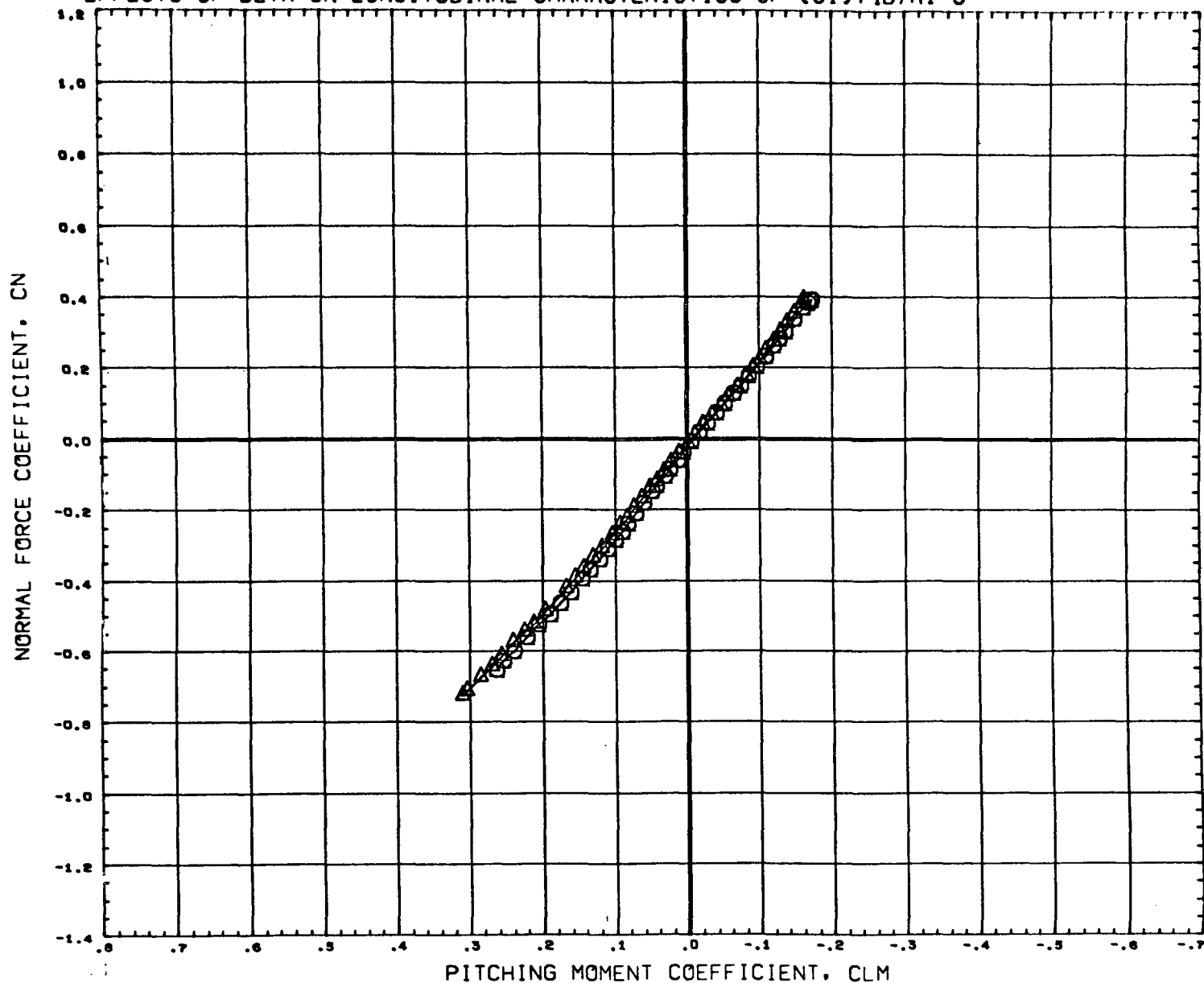
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 6.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.3004 IN.
 BREF 882.0004 IN.
 XHRP 557.0004 IN.
 YHRP 0.0000 IN.
 ZHRP 200.0004 IN.
 SCALE 0.0060 SCALE



MACH 1.09

PAGE 639

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74E4)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5
 (CD74E6)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

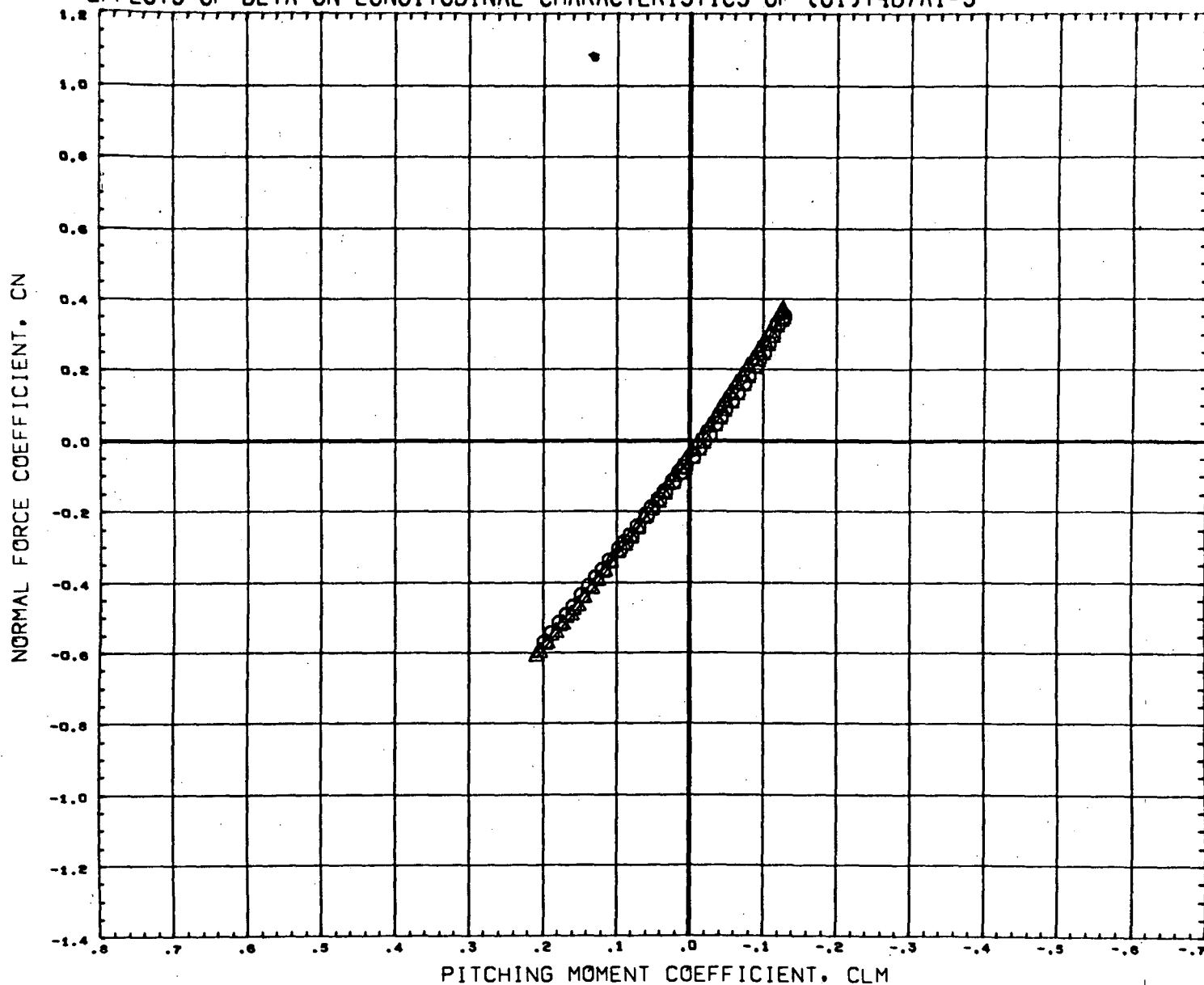
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 1.51

PAGE 640

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-5

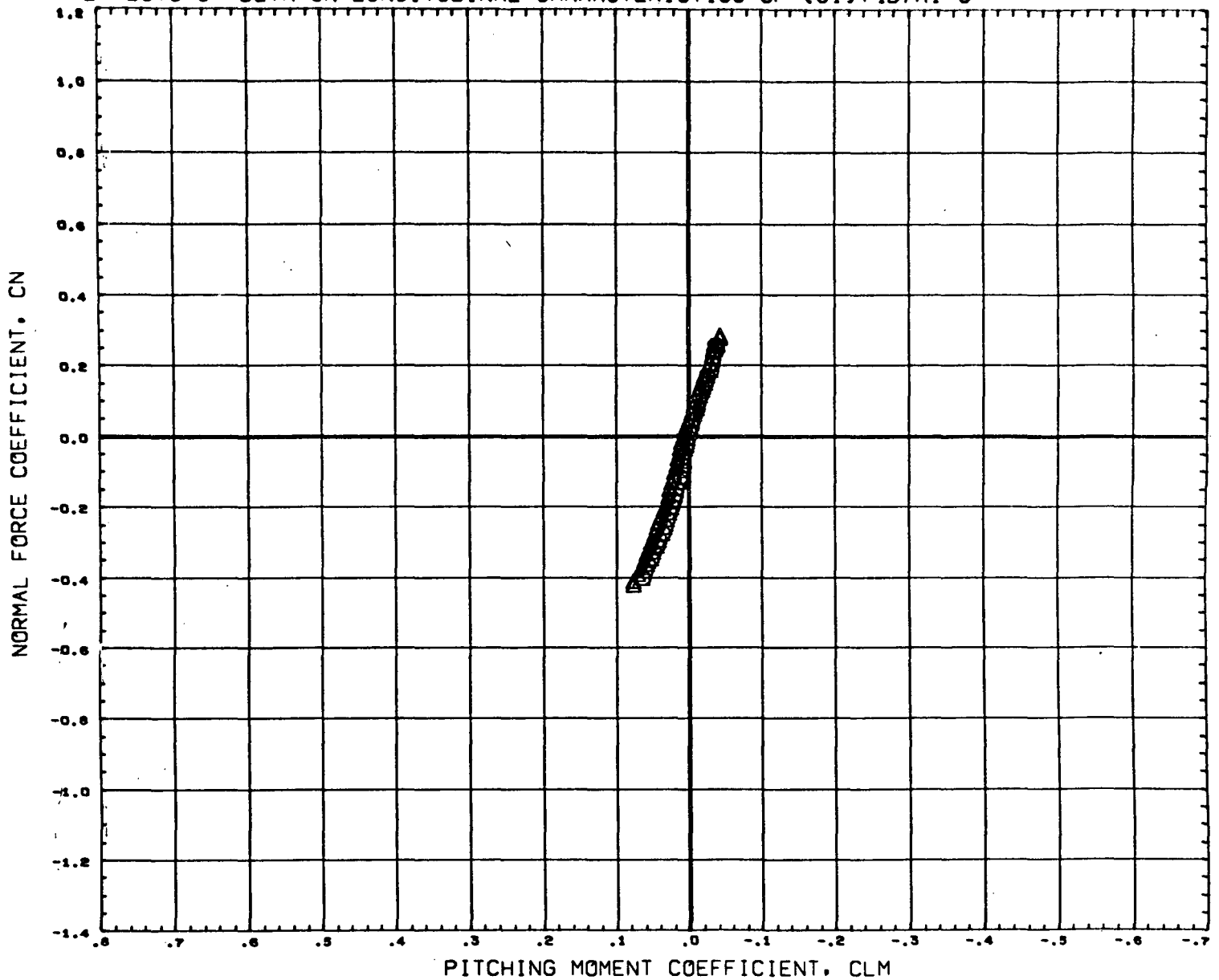


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 2.20

PAGE 641

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5

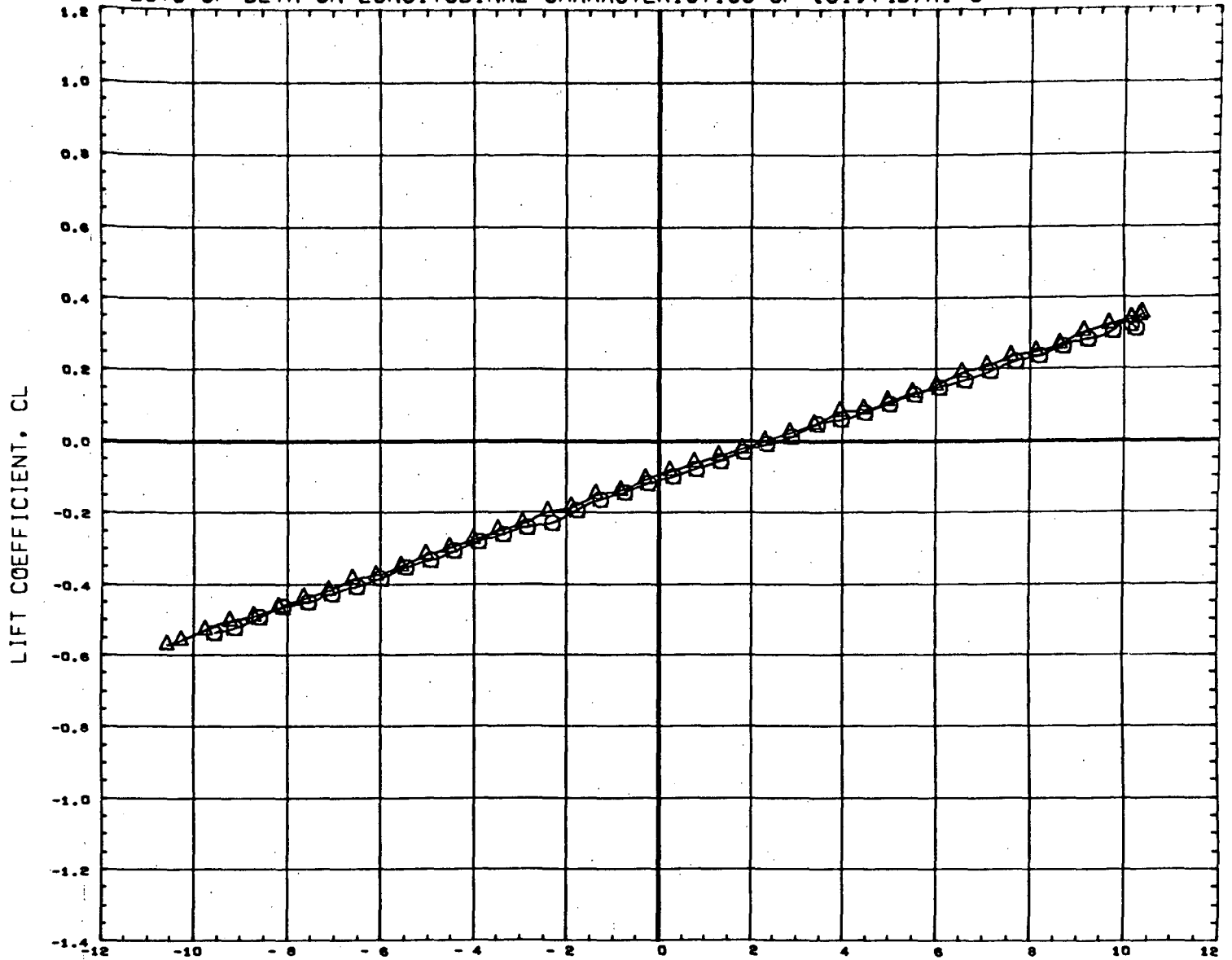


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | YMRP | 557.0004 IN. |
| | | | | | | ZMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

PAGE 642

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-5

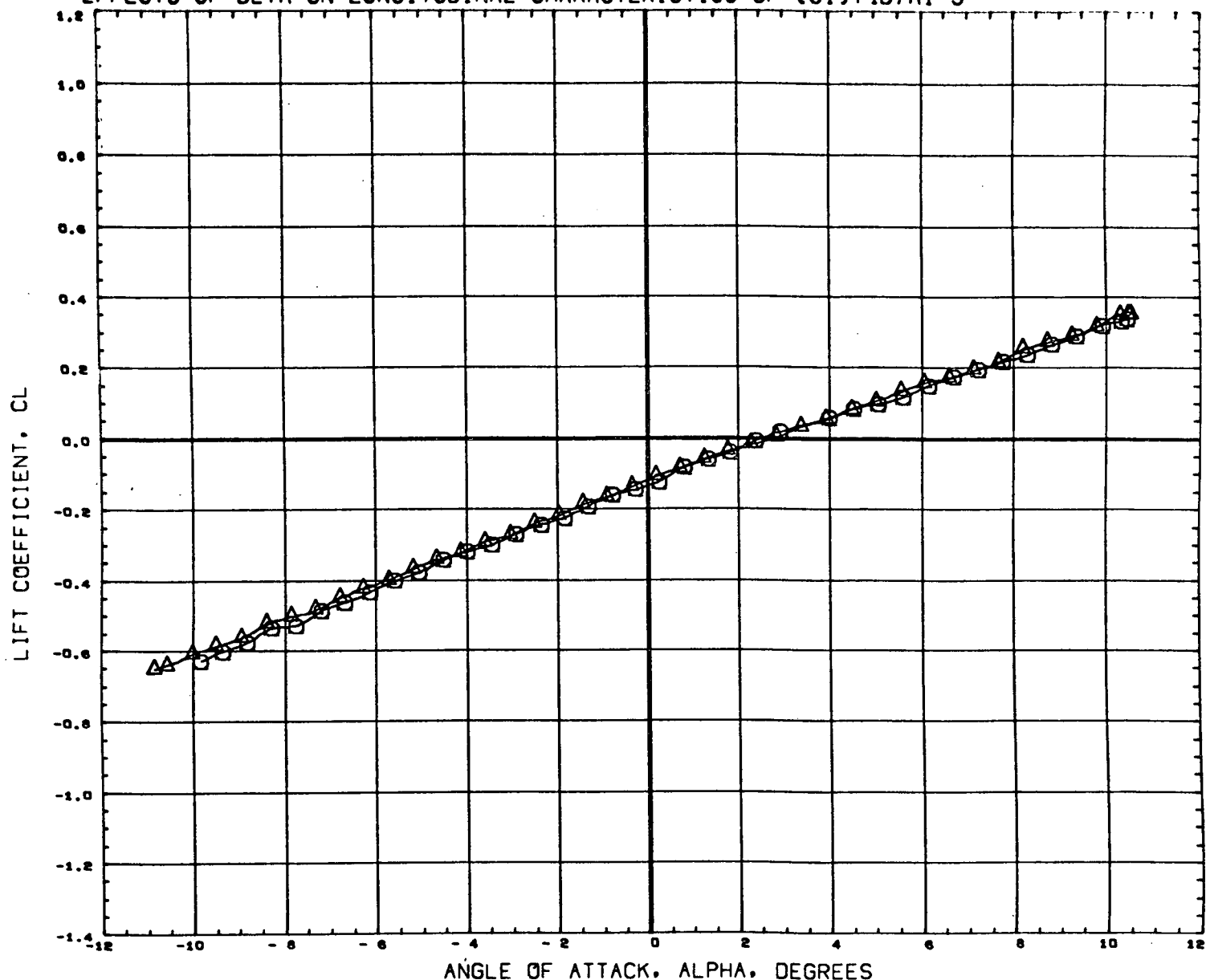


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 662.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

PAGE 643

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



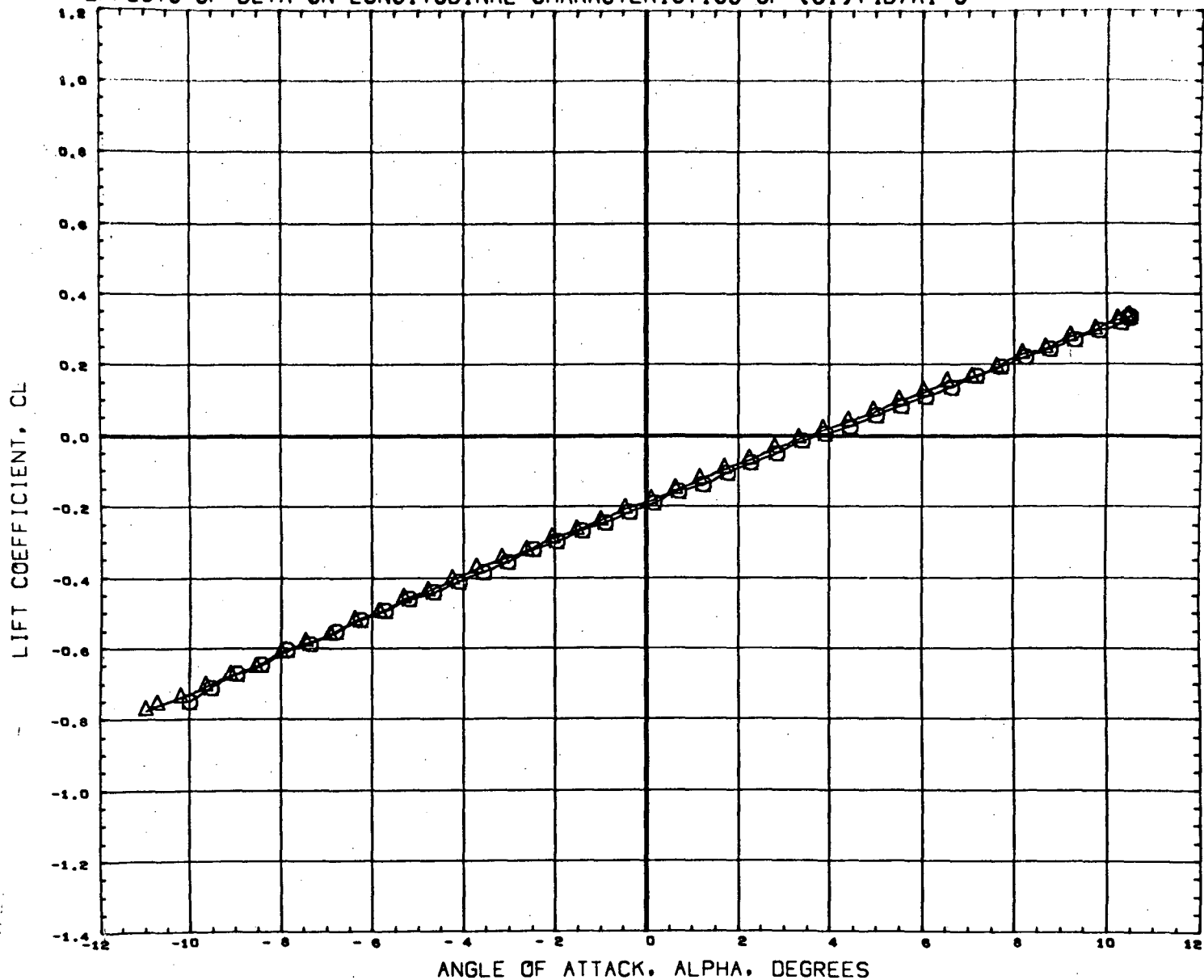
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD74E4) ○ | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 |
| (CD74E6) △ | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH .90

PAGE 644

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



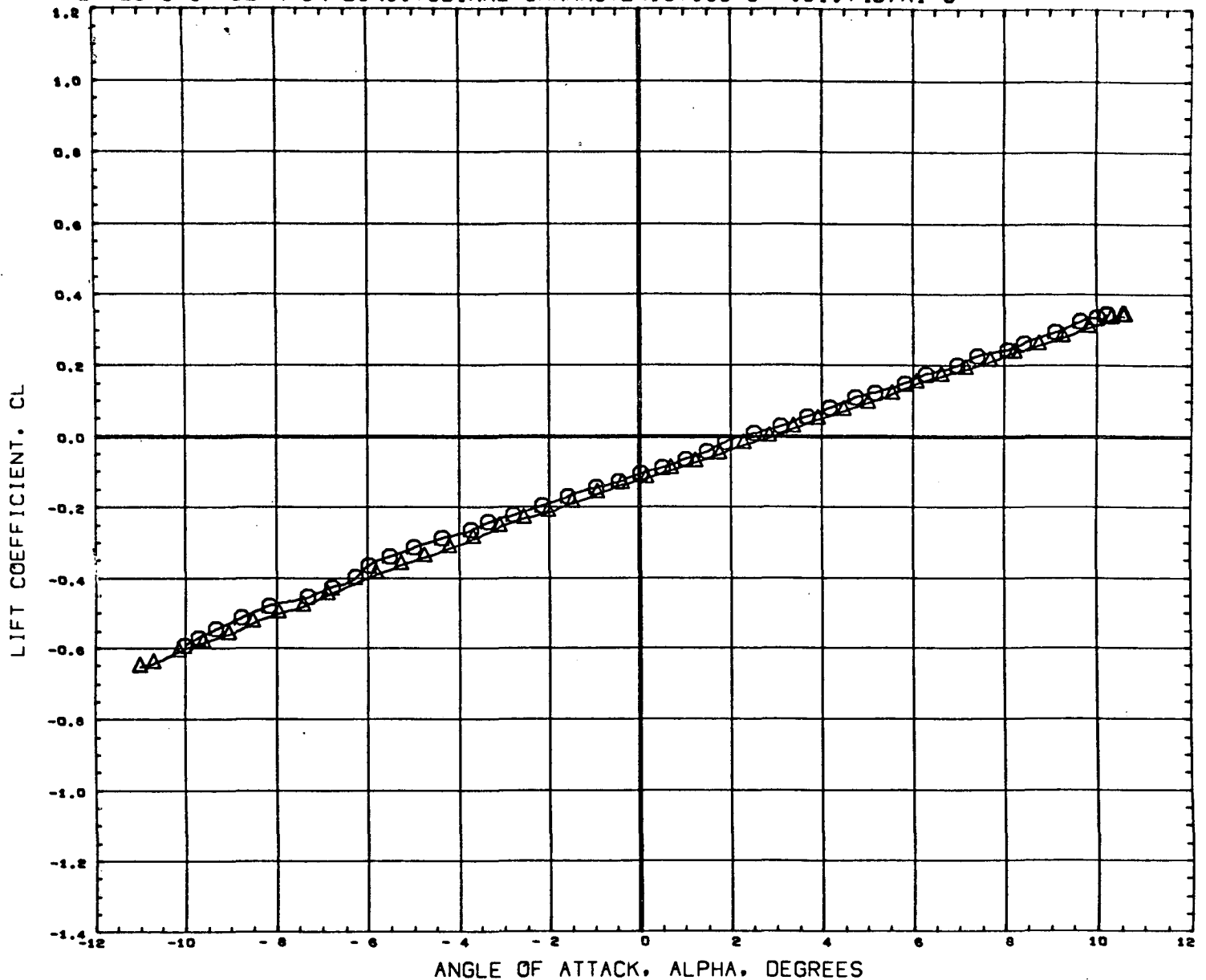
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
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| (CD74E6) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 1.09

PAGE 645

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5

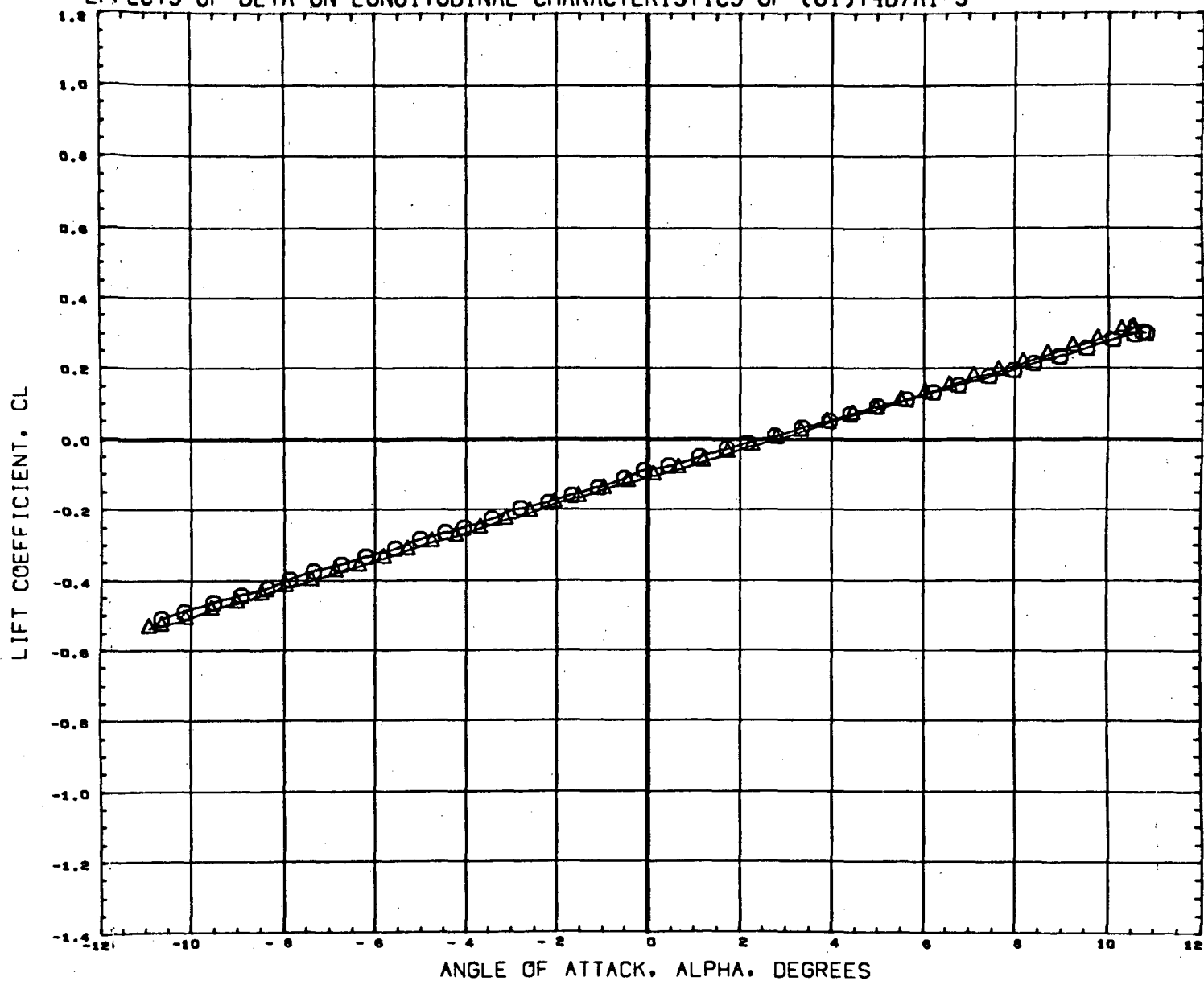


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.51

PAGE 646

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



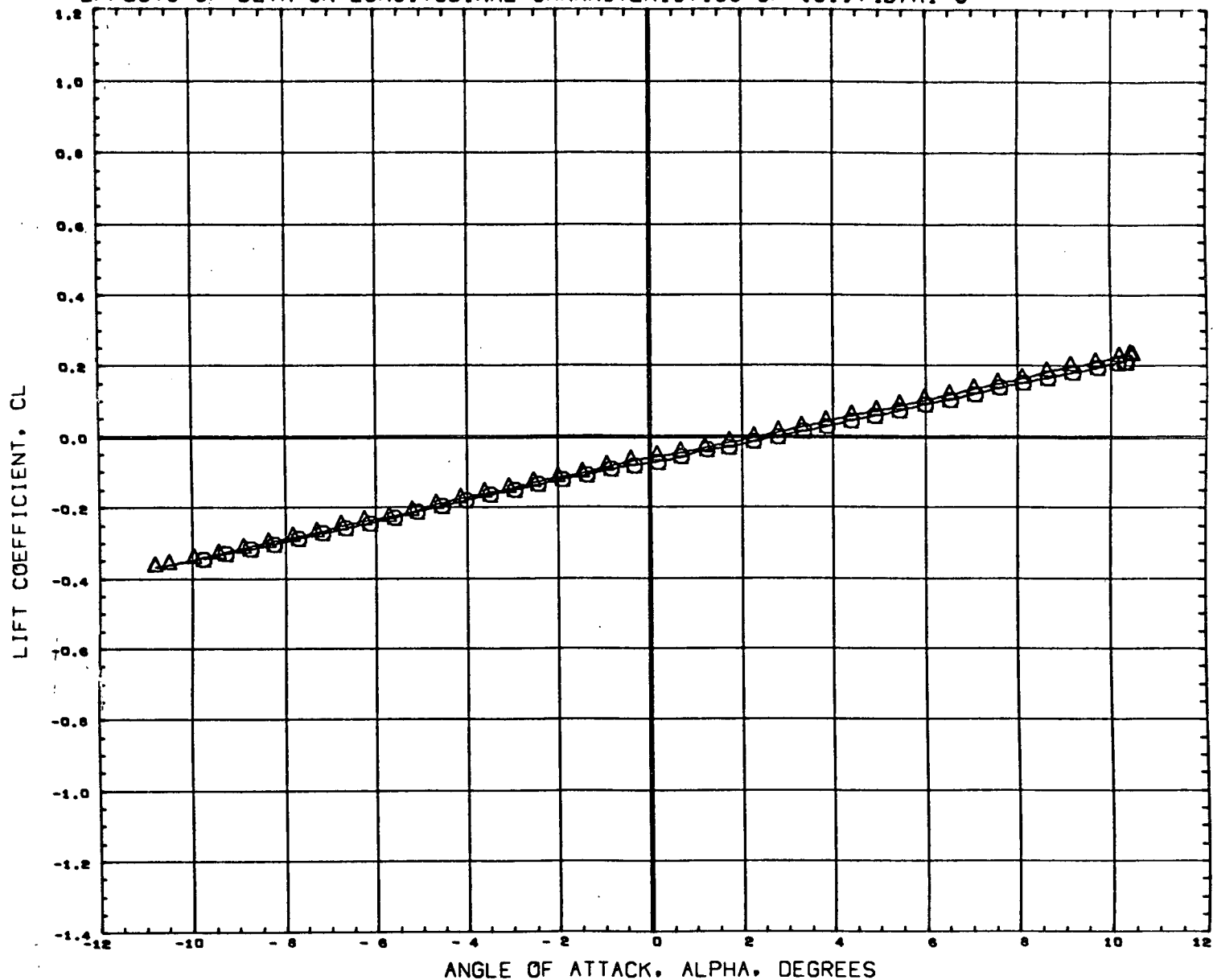
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD74E4) ○ | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 |
| (CD74E6) △ | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 537.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH 2.20

PAGE 647

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74E4) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5
 (CD74E6) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5

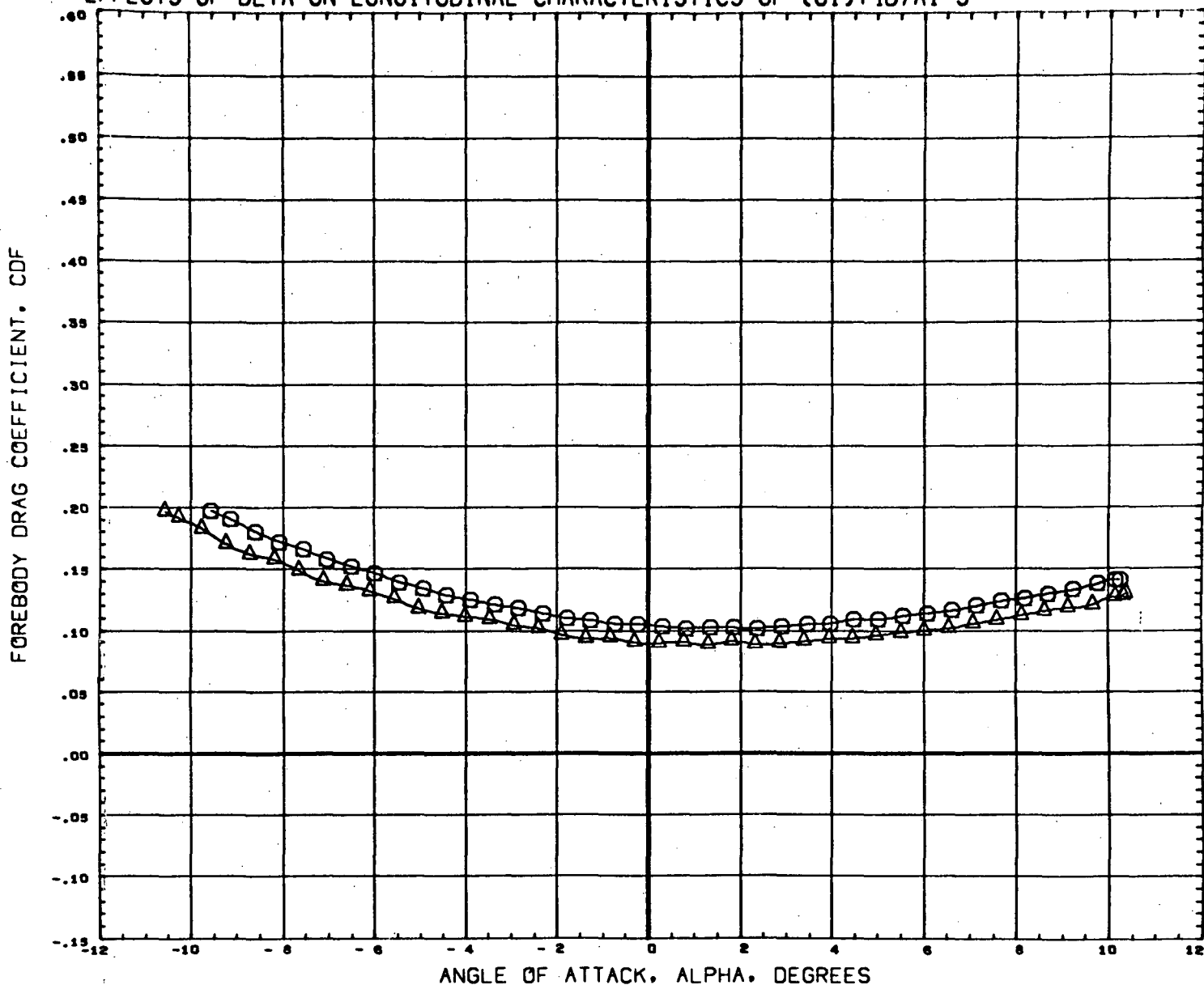
BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 6.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH 4.47

PAGE 648

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



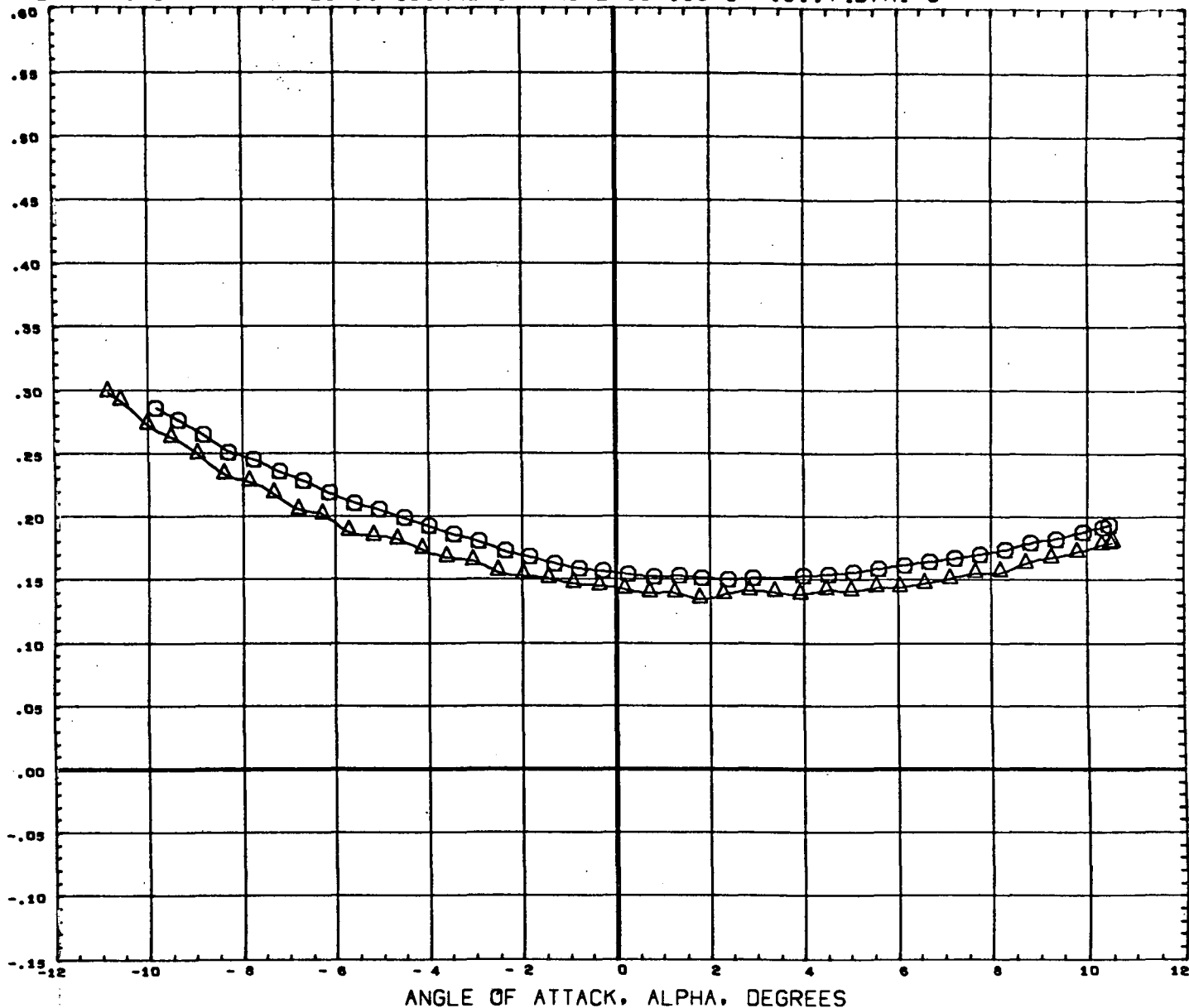
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5

FOREBODY DRAG COEFFICIENT, CDF



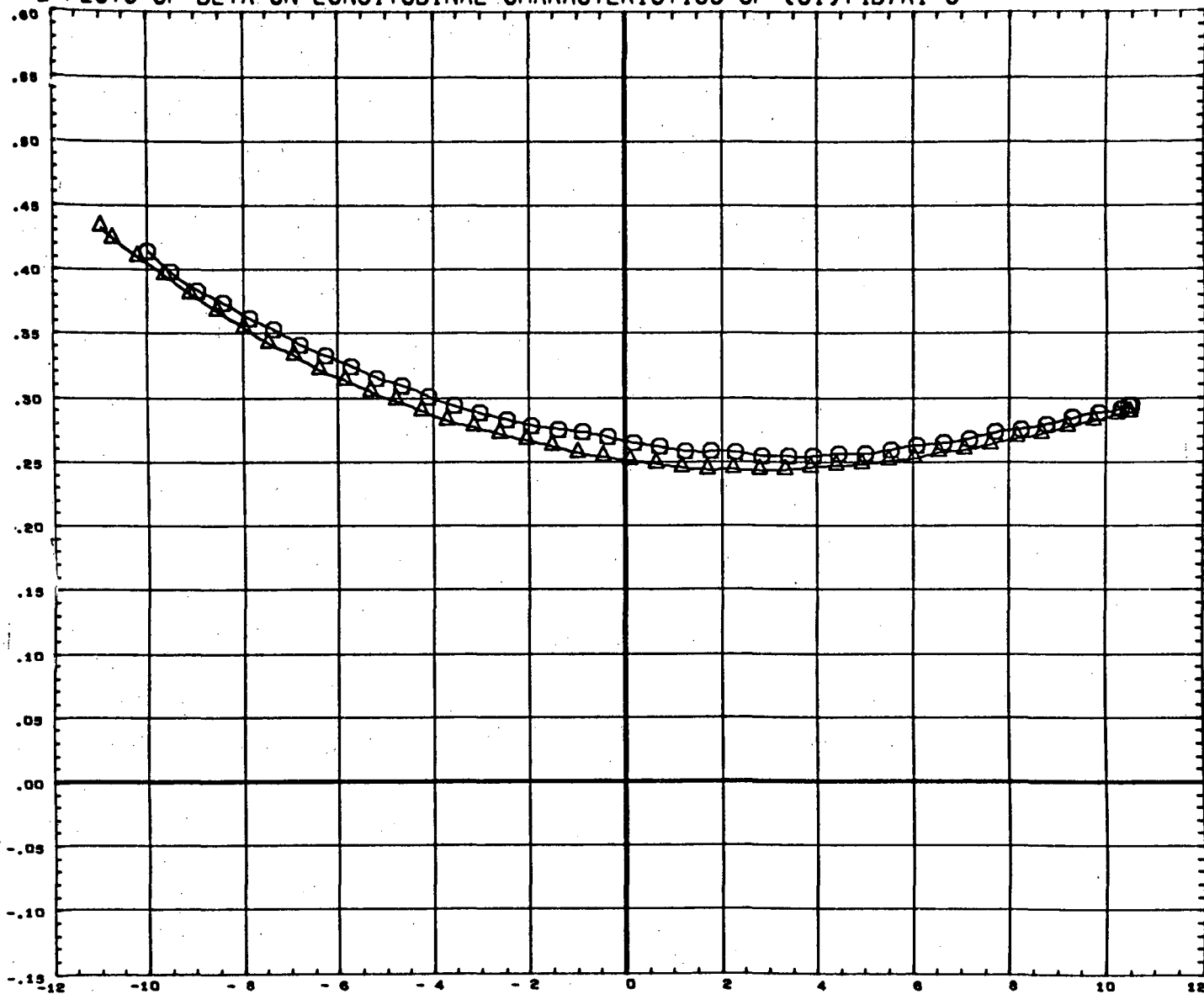
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0000 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

PAGE 650

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5

FOREBODY DRAG COEFFICIENT, CDF



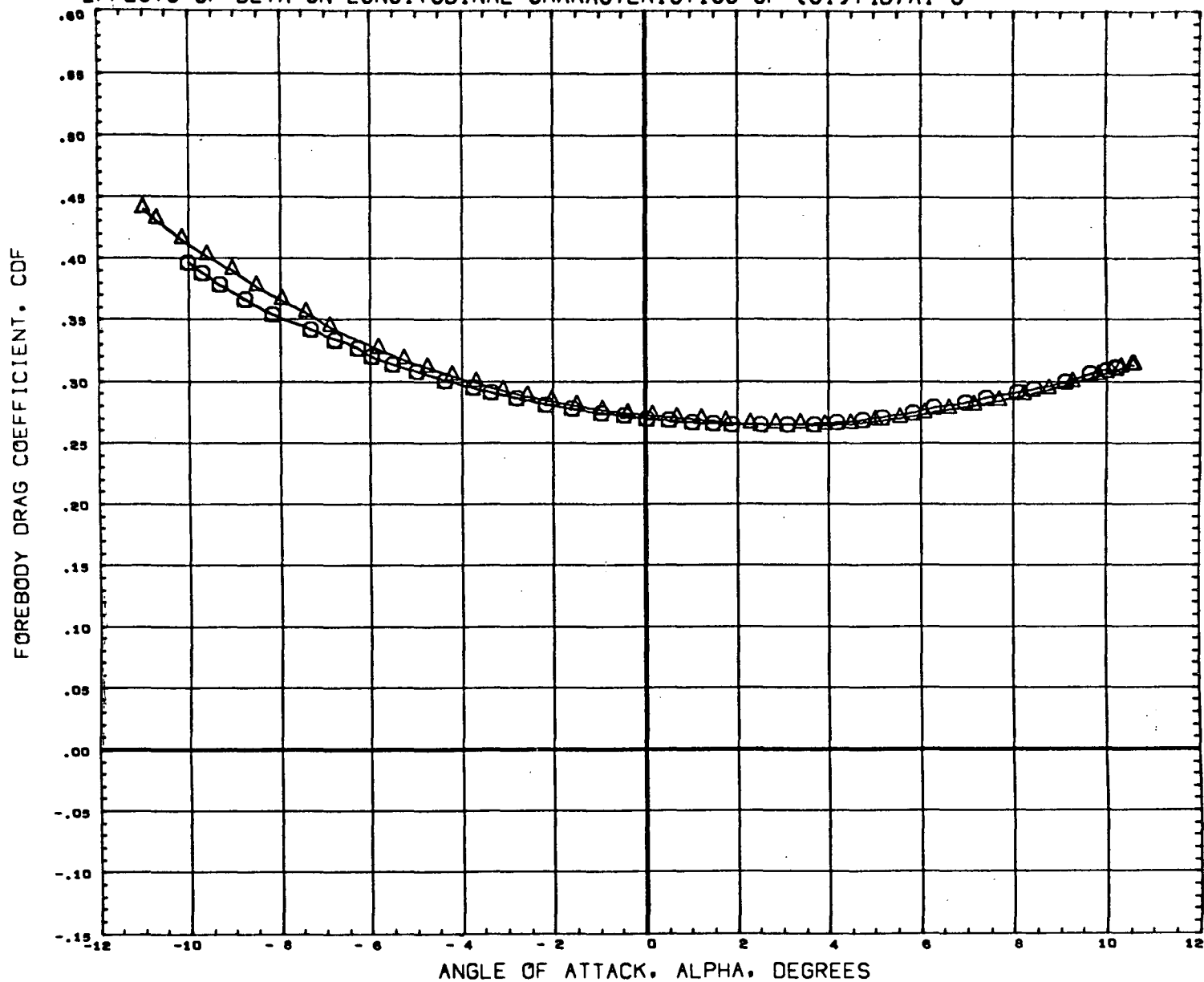
ANGLE OF ATTACK, ALPHA, DEGREES

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.09

PAGE 651

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



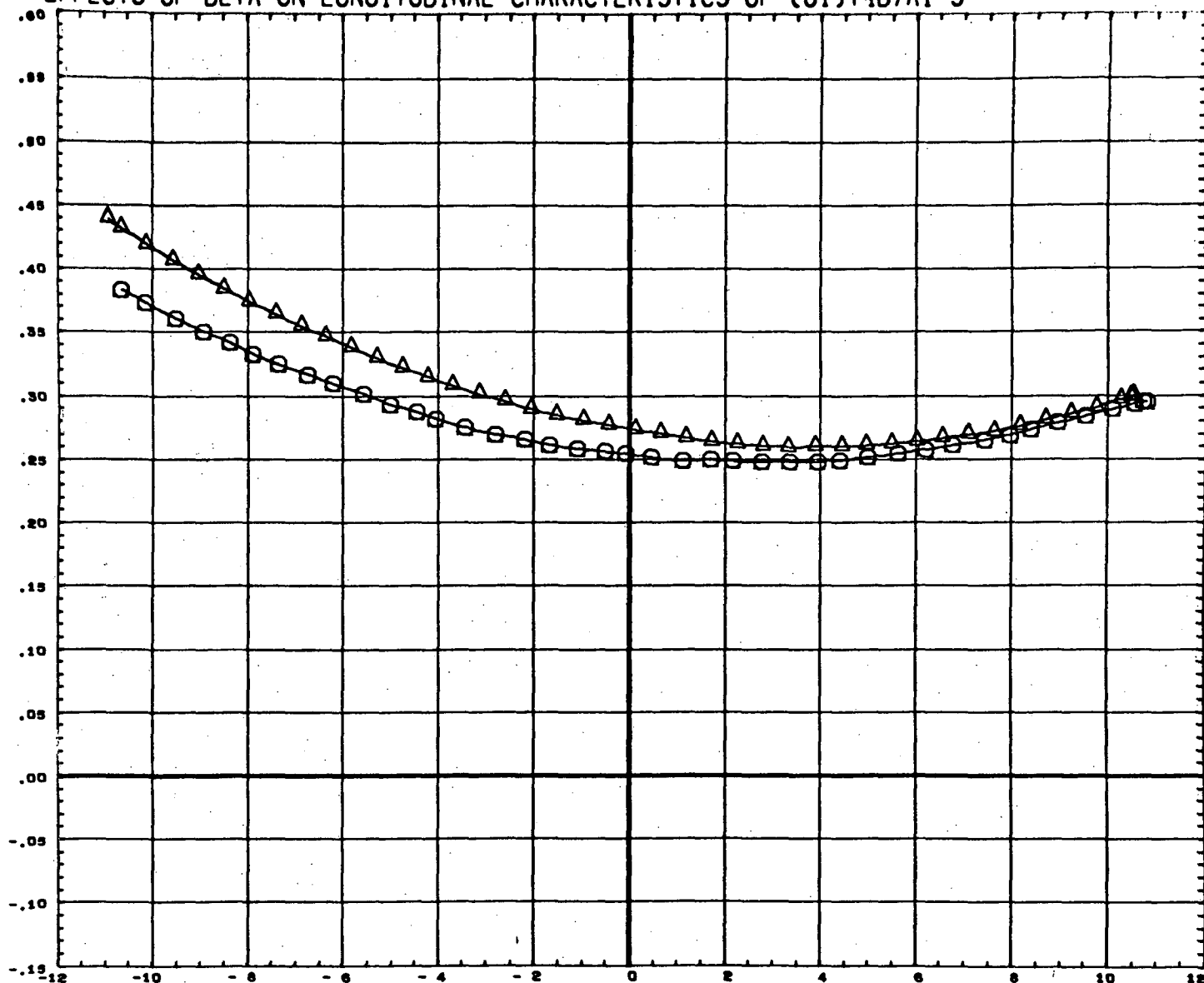
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.51

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5

FOREBODY DRAG COEFFICIENT, CDF



| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 |
| (CD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 |

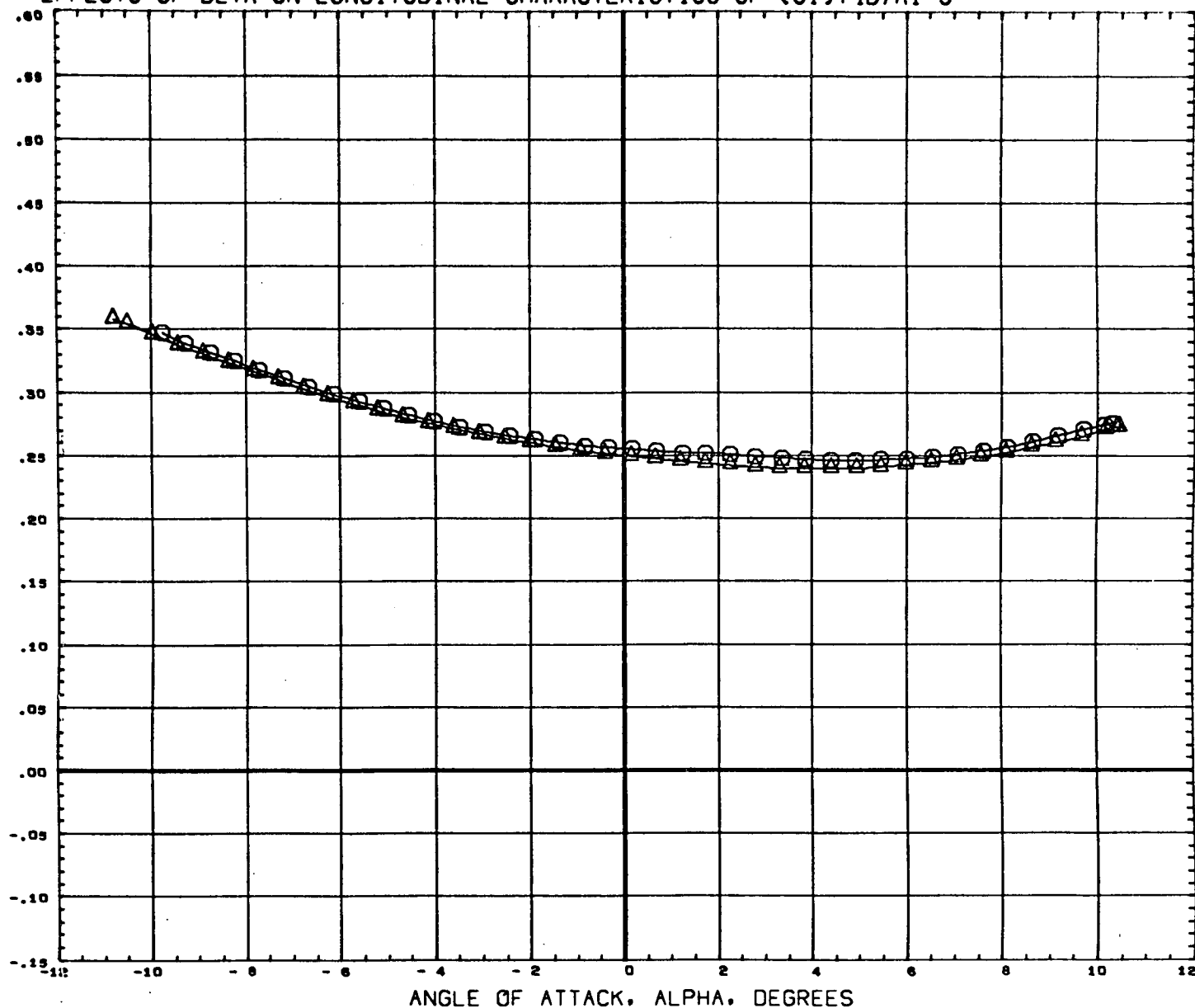
| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

MACH 2.20

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5

FOREBODY DRAG COEFFICIENT, CDF



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74E4) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5
 (CD74E6) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

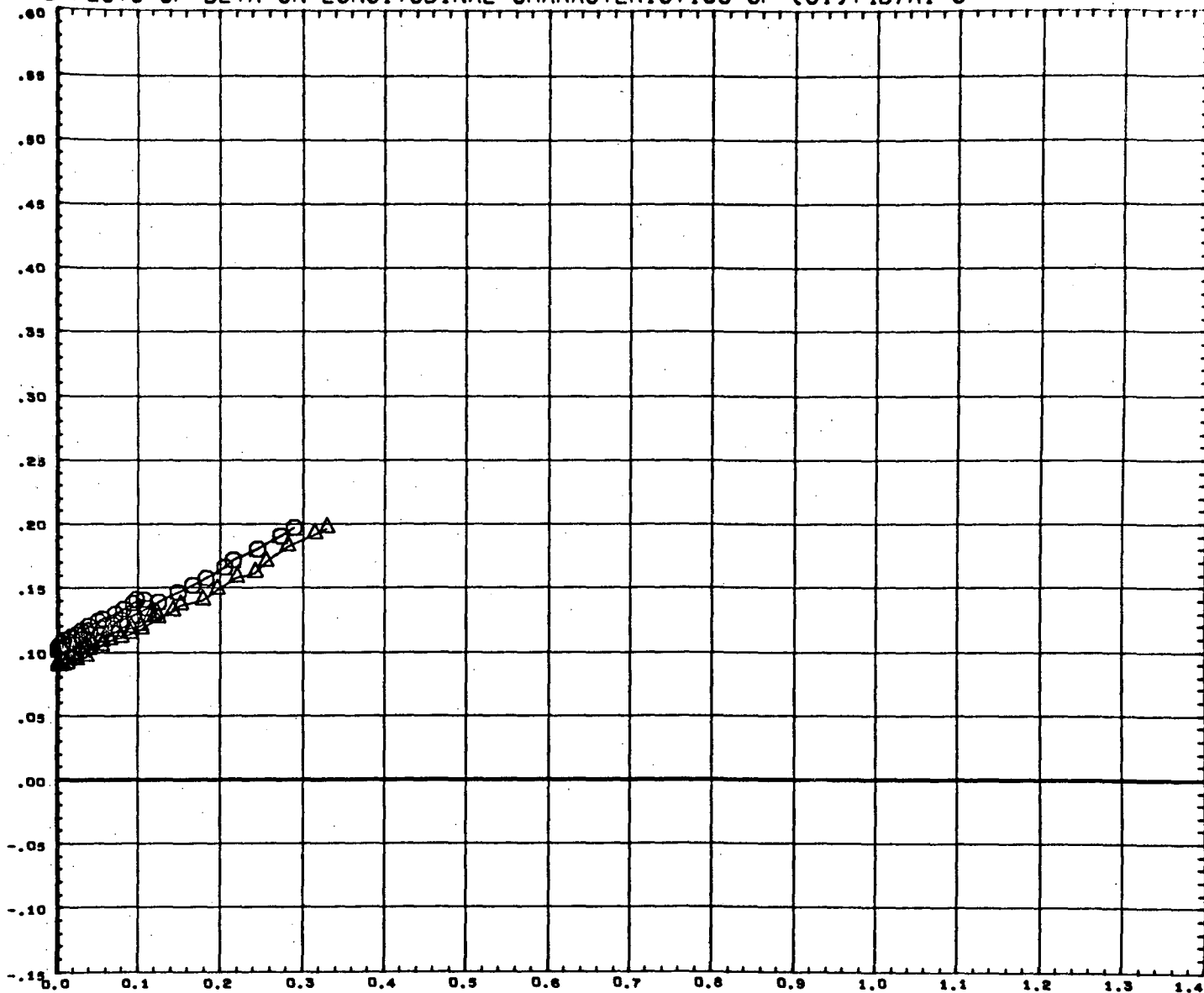
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 4.47

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5

FOREBODY DRAG COEFFICIENT, CDF



LIFT COEFFICIENT SQUARED, CLSQ

DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74E4) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5
 (CD74E6) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

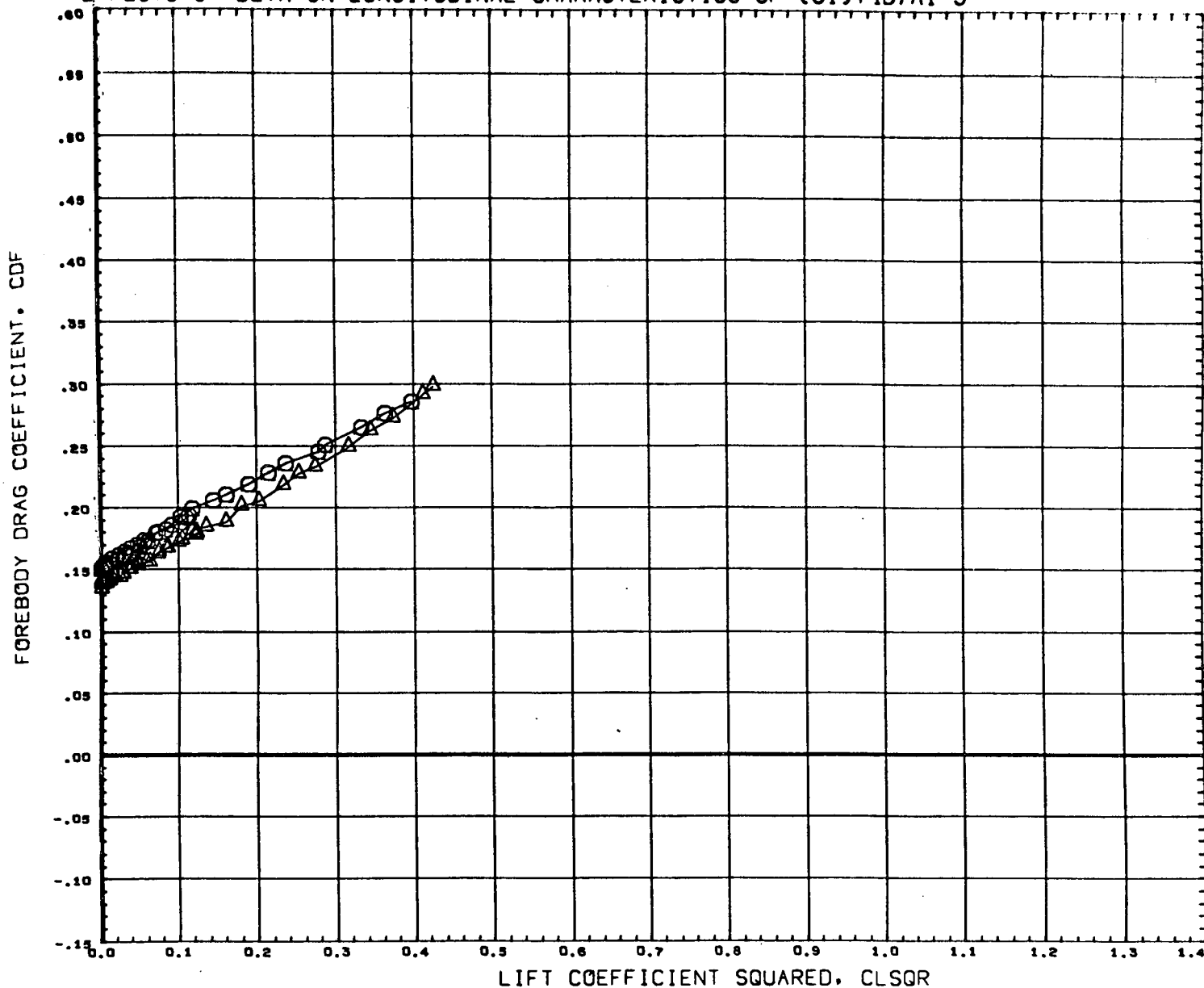
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3135.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 662.0004 | IN. |
| XMRP | 957.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH .58

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5

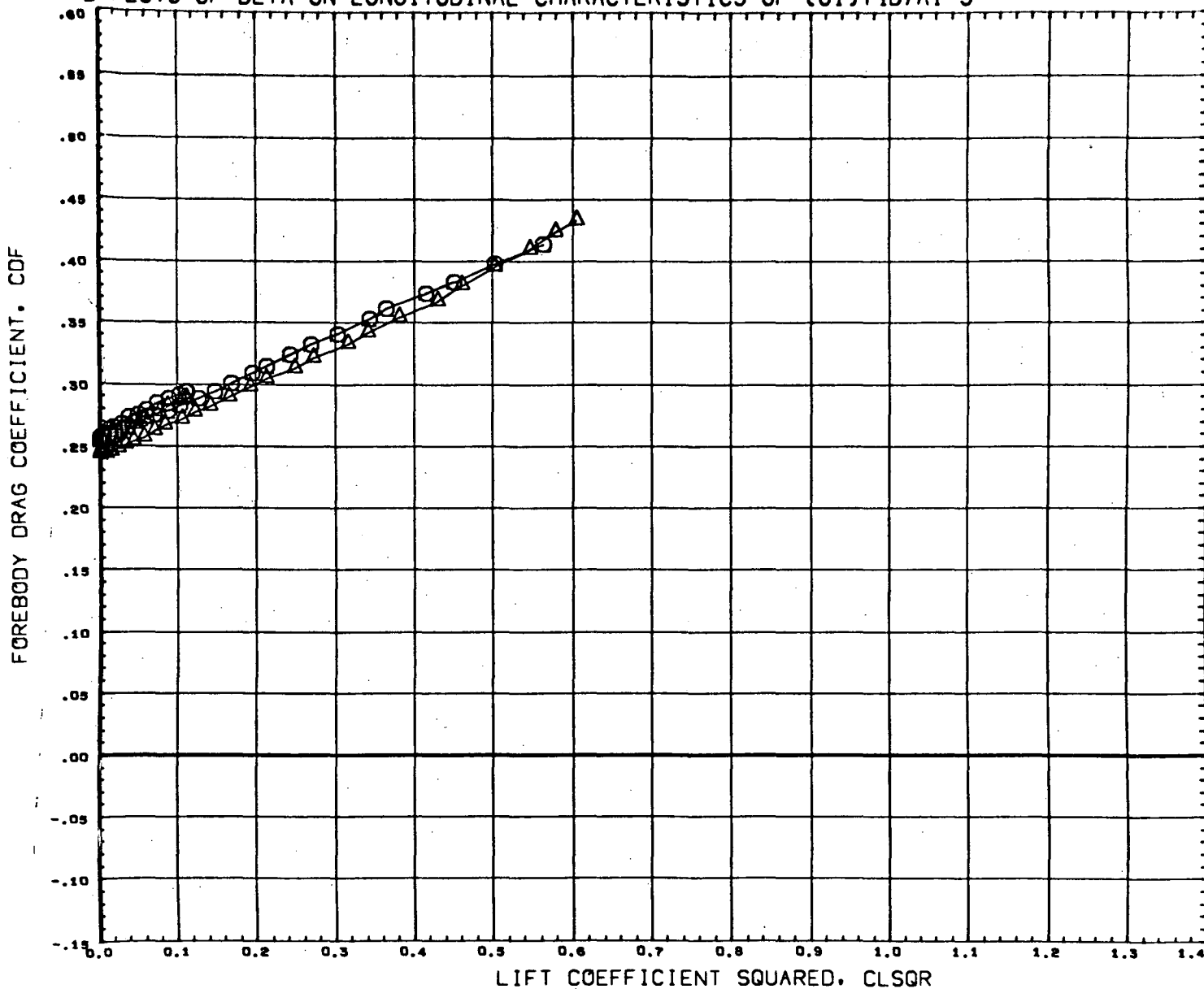


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



DATA SET SYMBOL CONFIGURATION DESCRIPTION

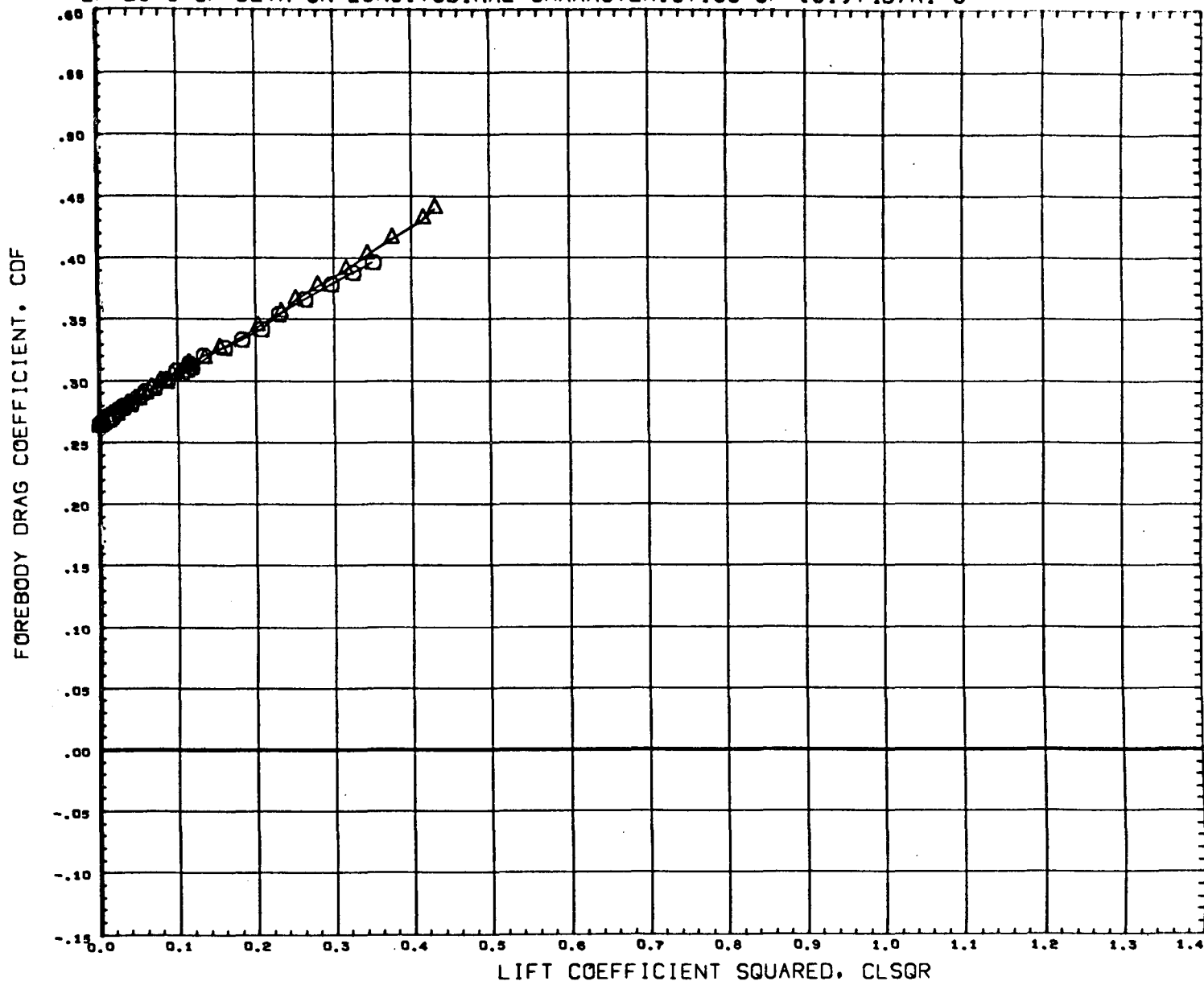
(CD74E4) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5
 (CD74E6) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | | |
|-------|--------|--------|--------|-----------------------|-----------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 | sq.ft. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 | in. |
| | | | | BREF | 882.0004 | in. |
| | | | | XMRP | 557.0004 | in. |
| | | | | YMRP | 0.0000 | in. |
| | | | | ZMRP | 200.0004 | in. |
| | | | | SCALE | 0.0060 | SCALE |

MACH 1.09

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (CD74E4) ○ MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5
 (CD74E6) △ MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 6.000 0.000 0.000 0.000

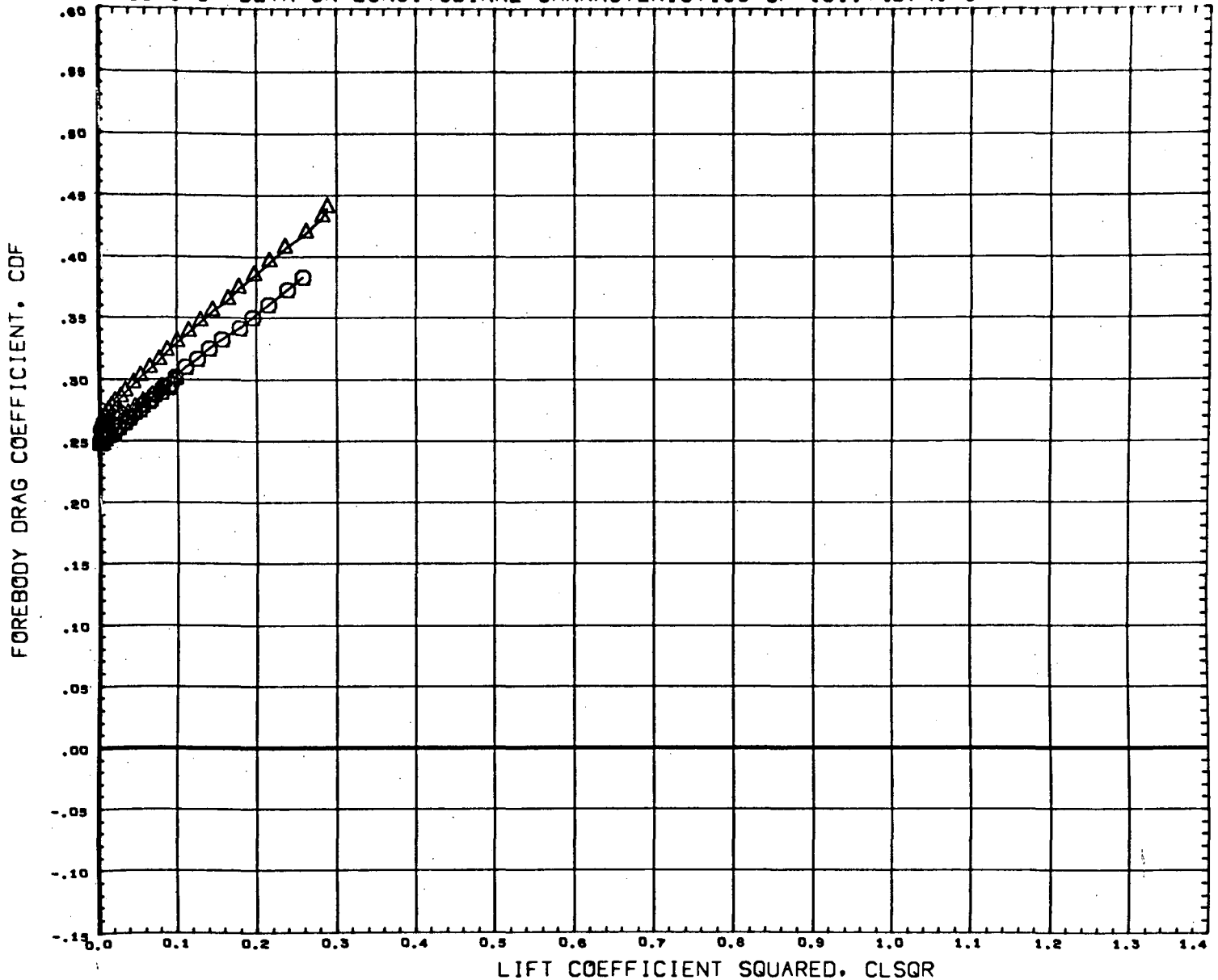
REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 357.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



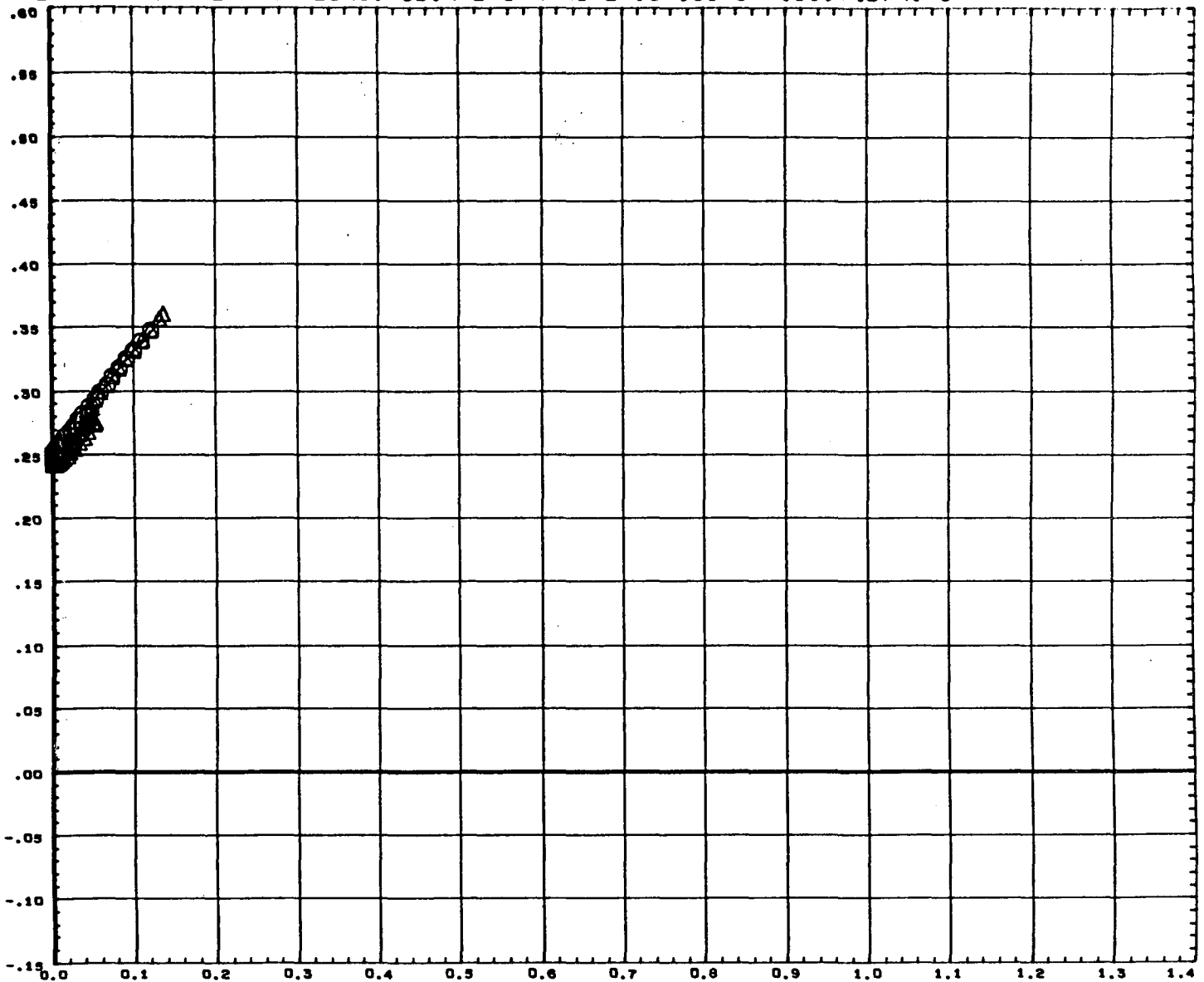
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRF | 537.0004 IN. |
| | | | | | | YMRF | 0.0000 IN. |
| | | | | | | ZMRF | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5

FOREBODY DRAG COEFFICIENT, CDF



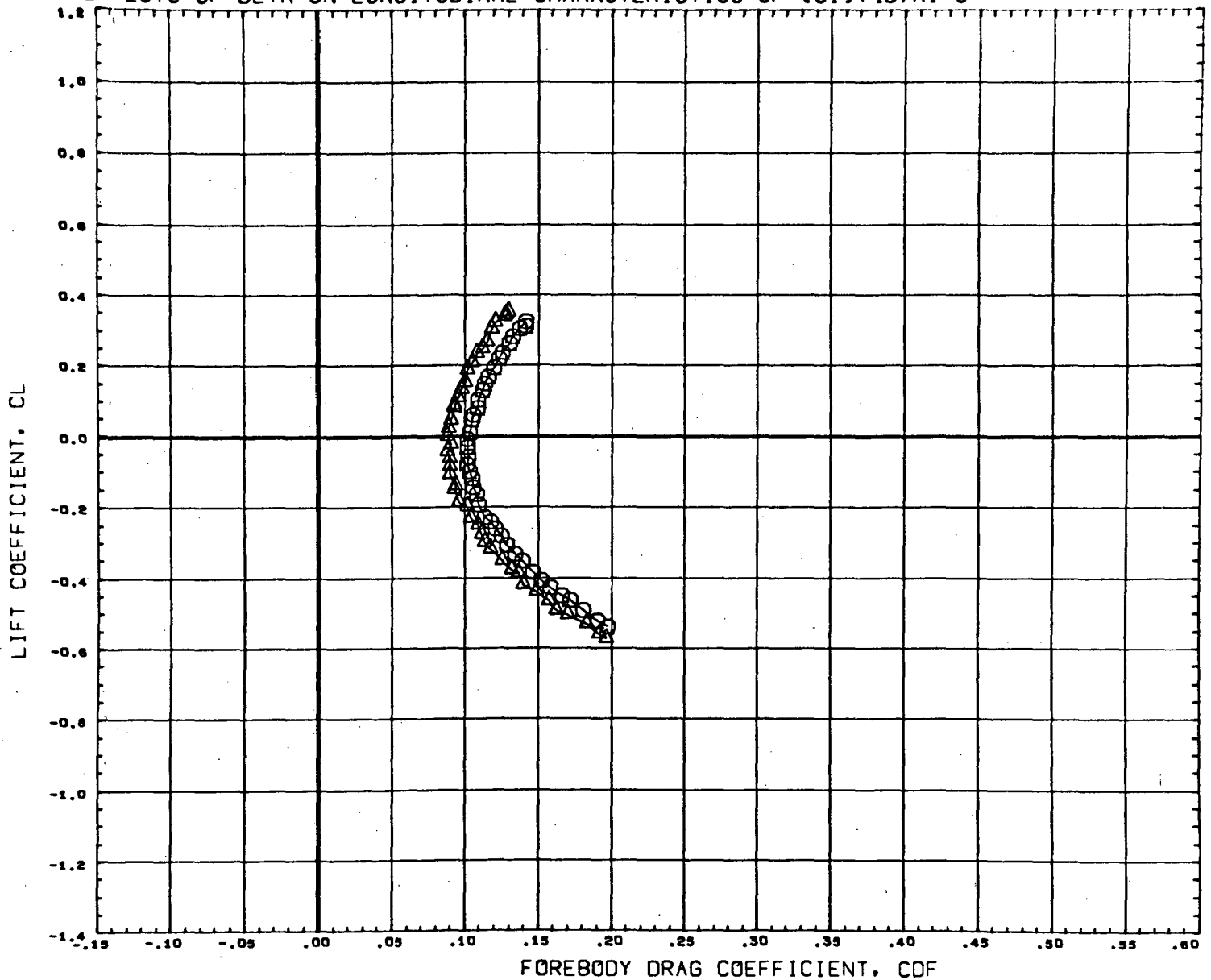
LIFT COEFFICIENT SQUARED, CLSQR

| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | ATLRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5

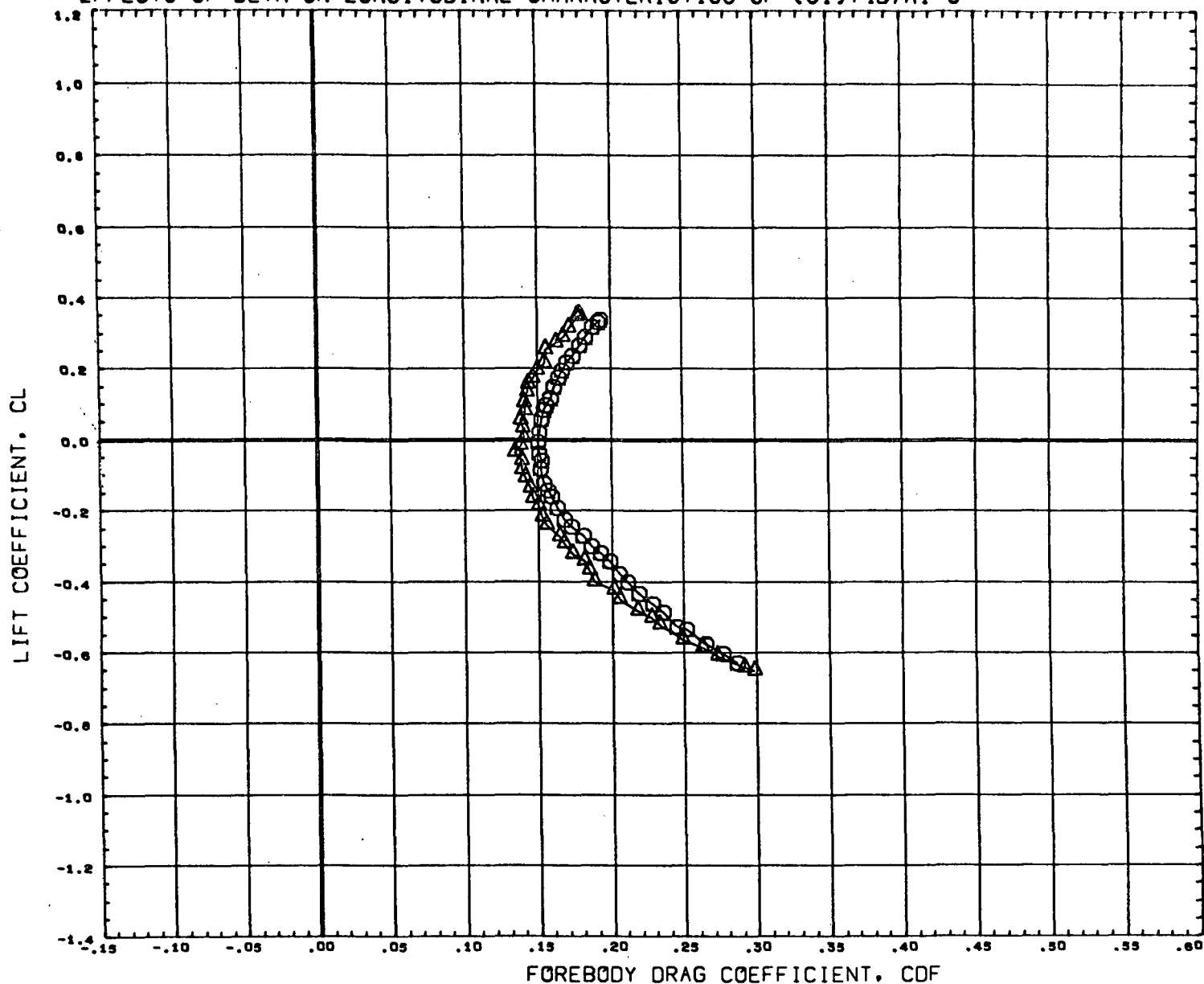


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-5



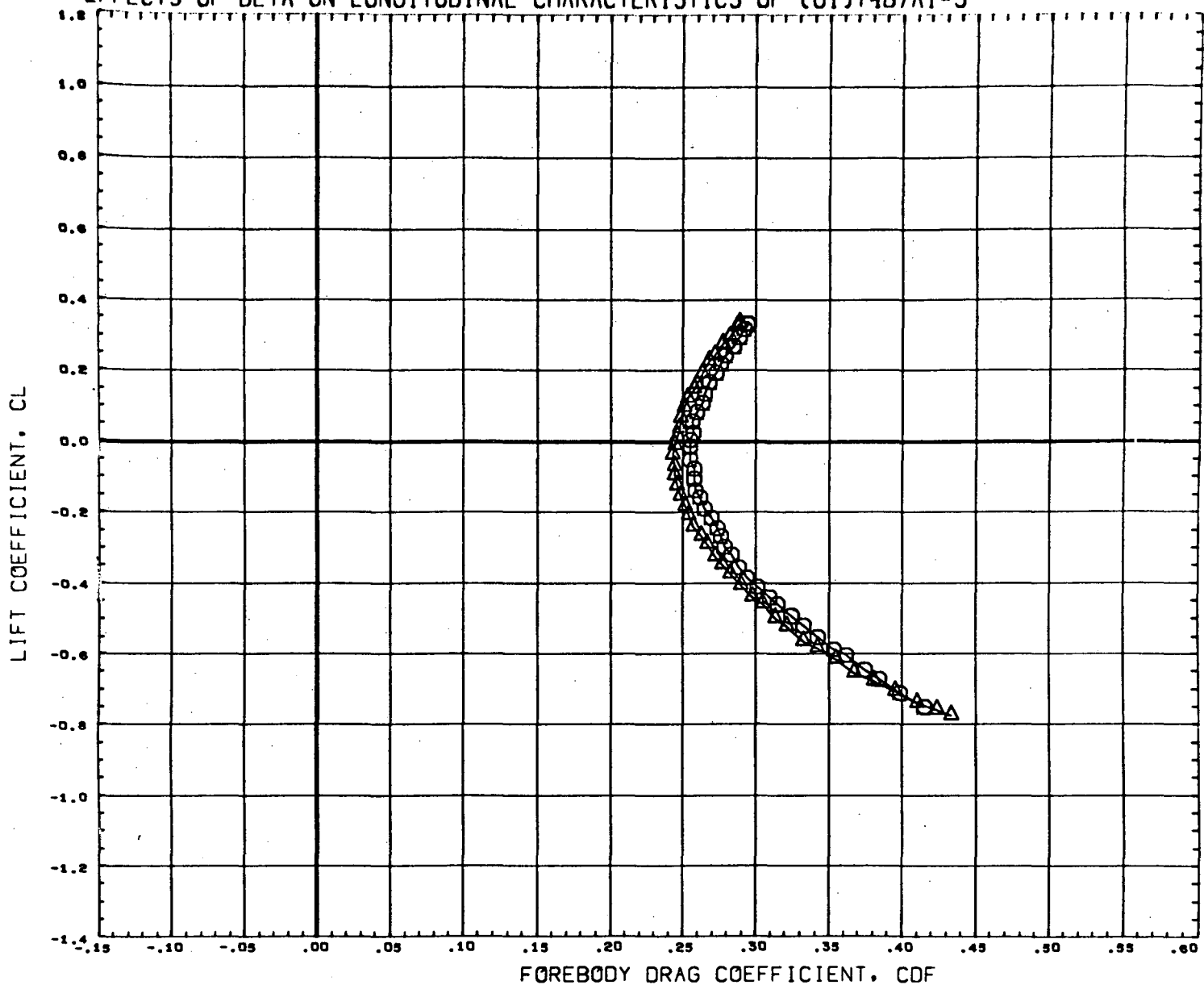
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-5 |
| (CD74E6) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-5 |

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 537.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH .90

EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-5



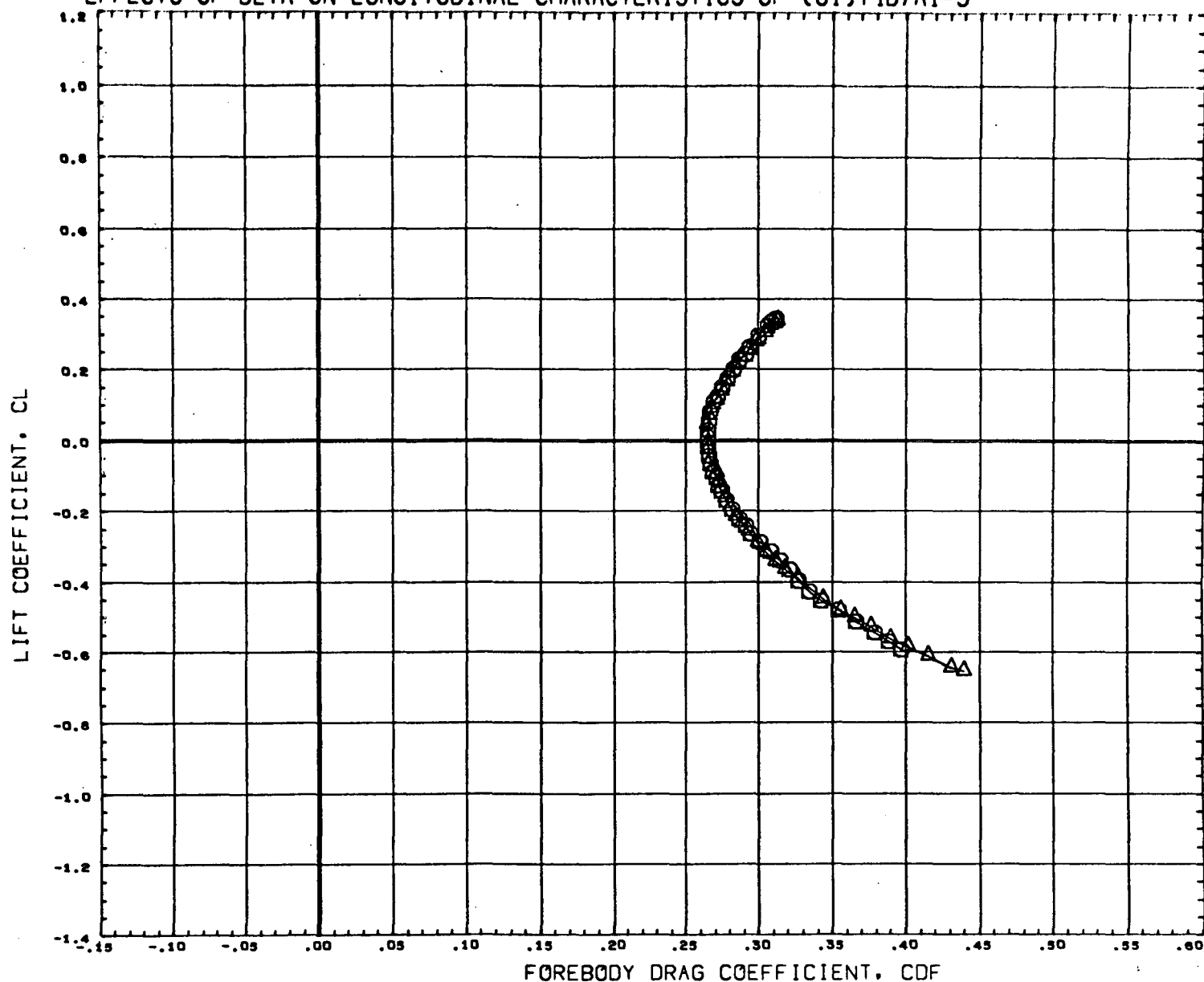
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-5 |
| (CD74E6) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-5 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |



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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74E4)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5
(CD74E6)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

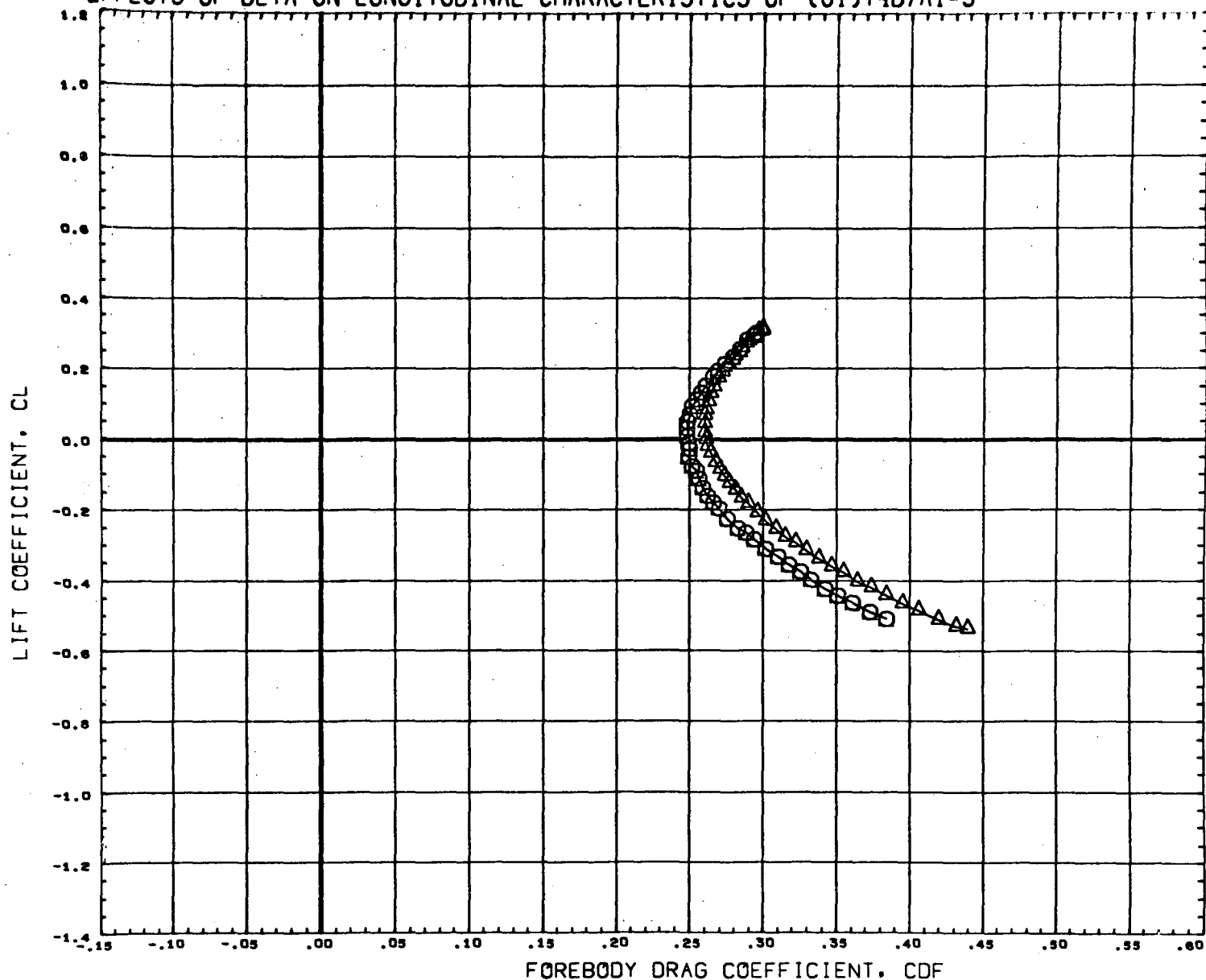
| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| YMRP | 557.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH 1.51

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74E4) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5
 (CD74E6) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 6.000 0.000 0.000 0.000

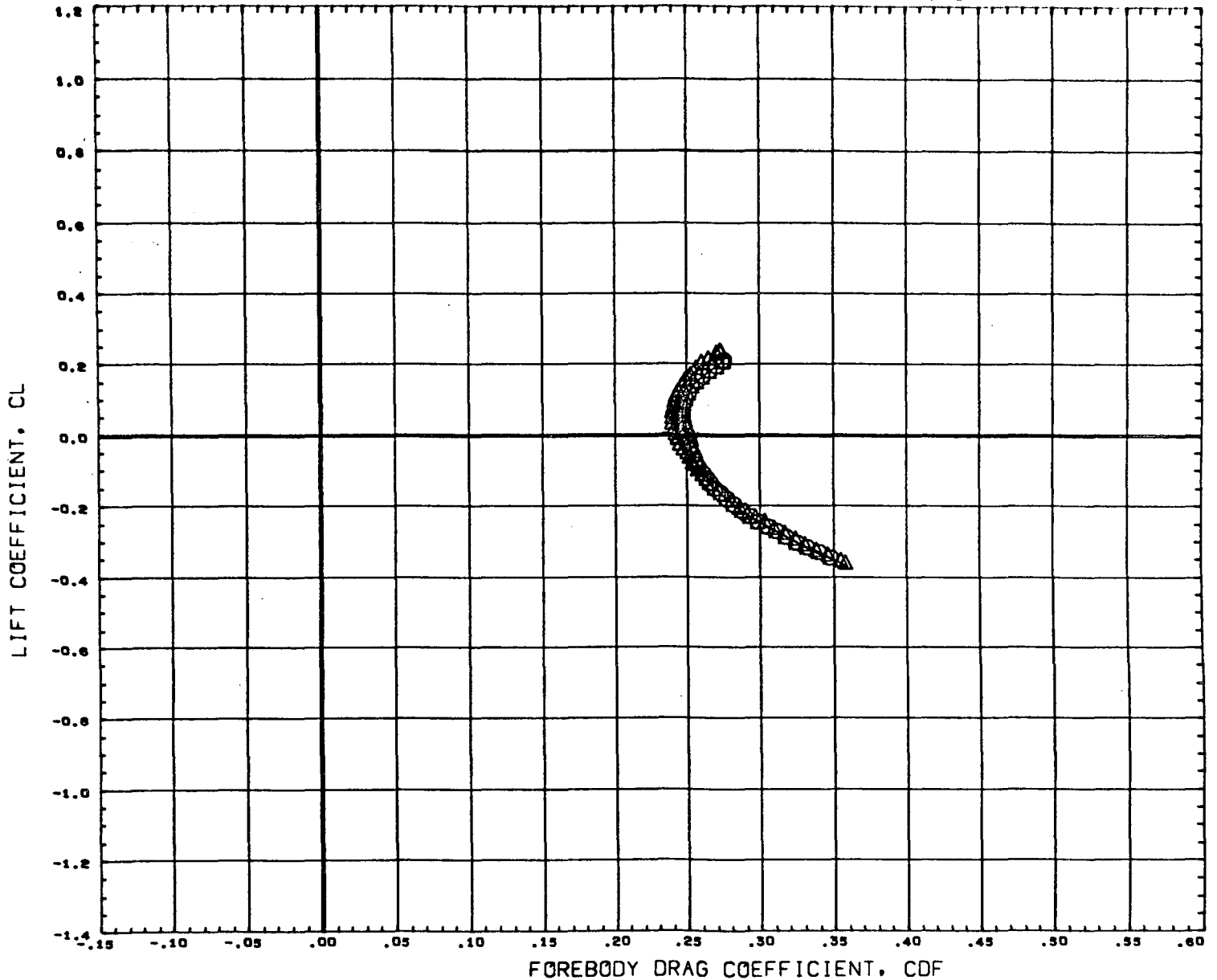
REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



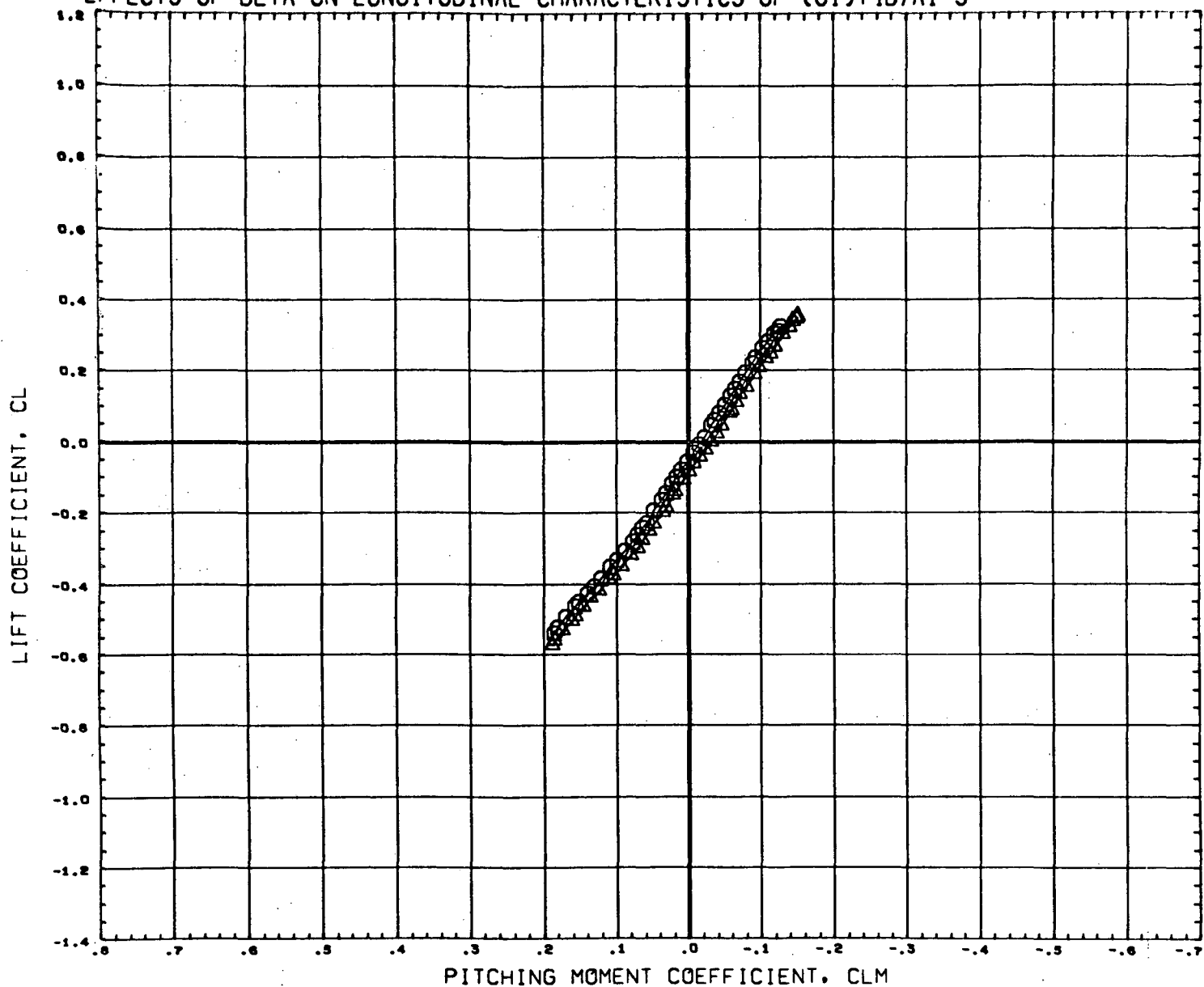
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (CD74E4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 |
| (CD74E6) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5

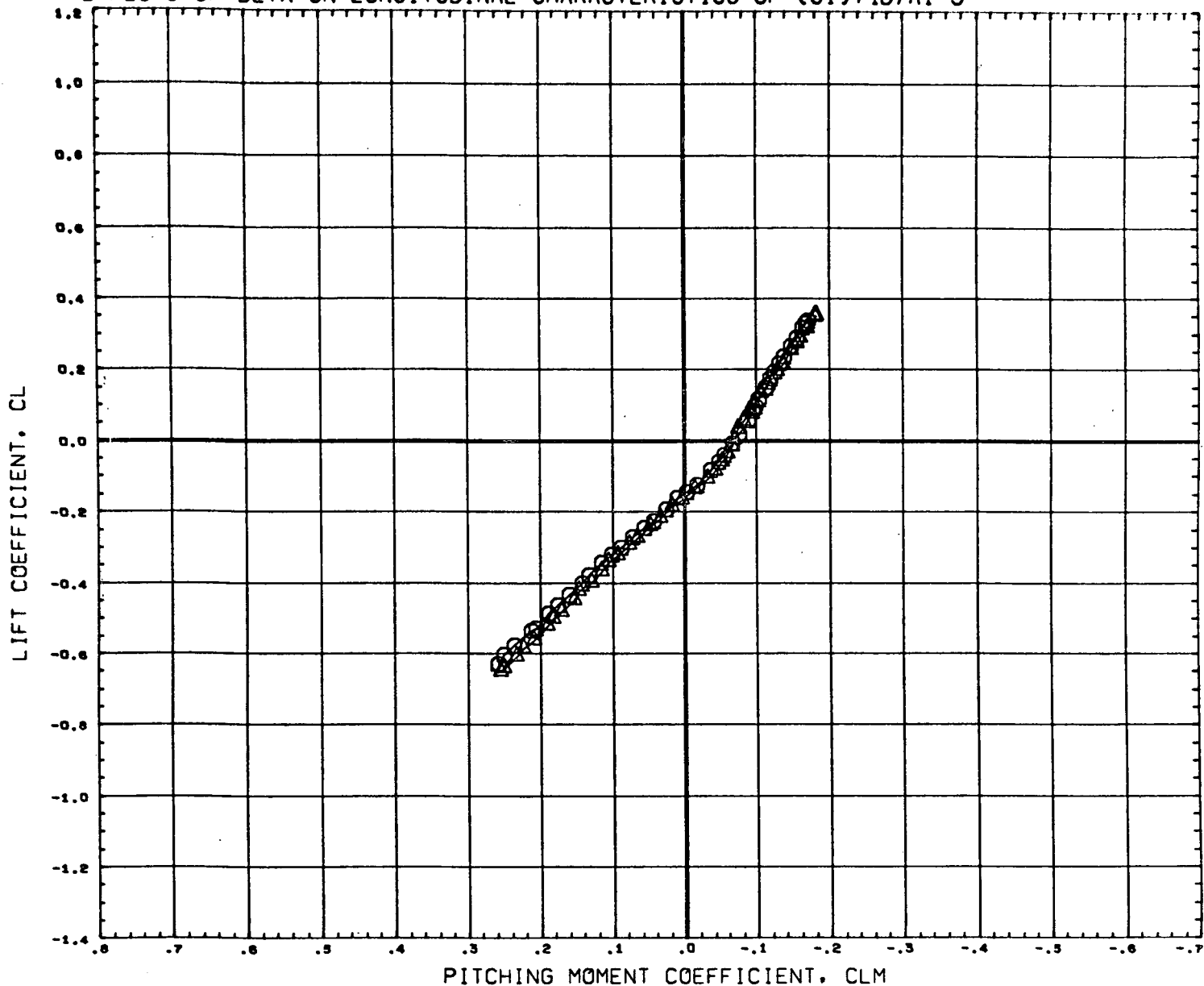


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 537.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(CD74E4) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5
 (CD74E6) MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

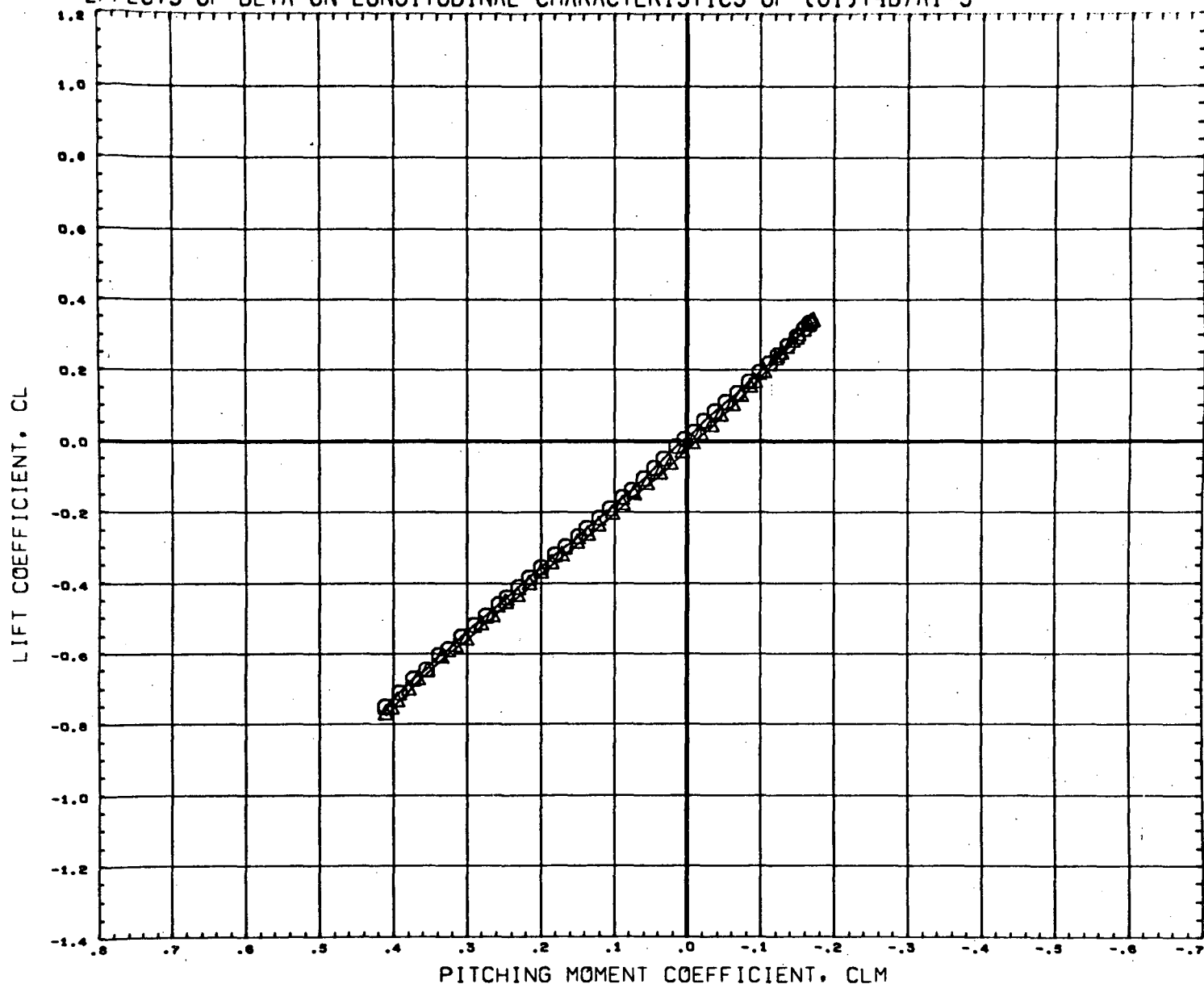
BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 6.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 537.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (O1)T4B7A1-5

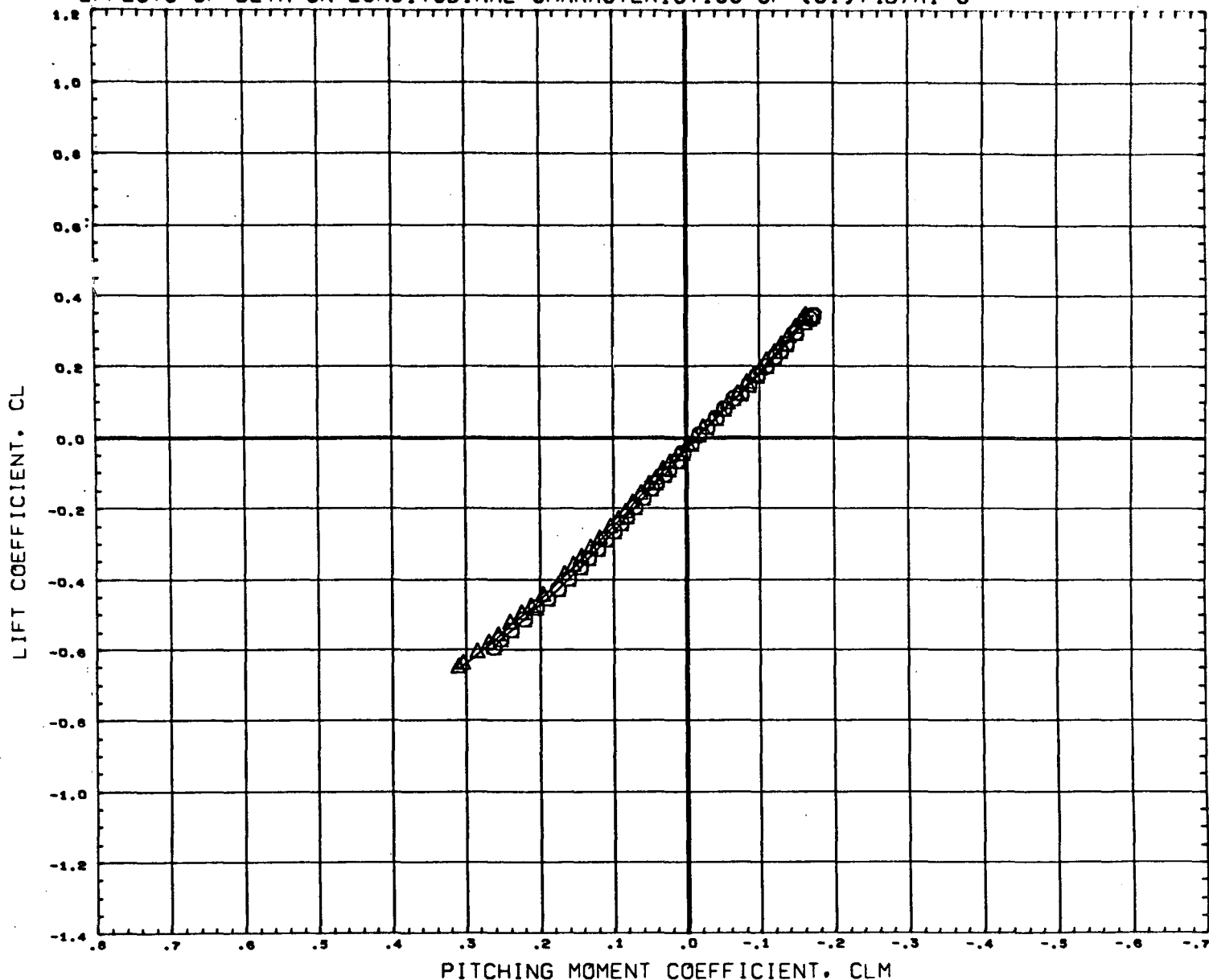


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.09

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5

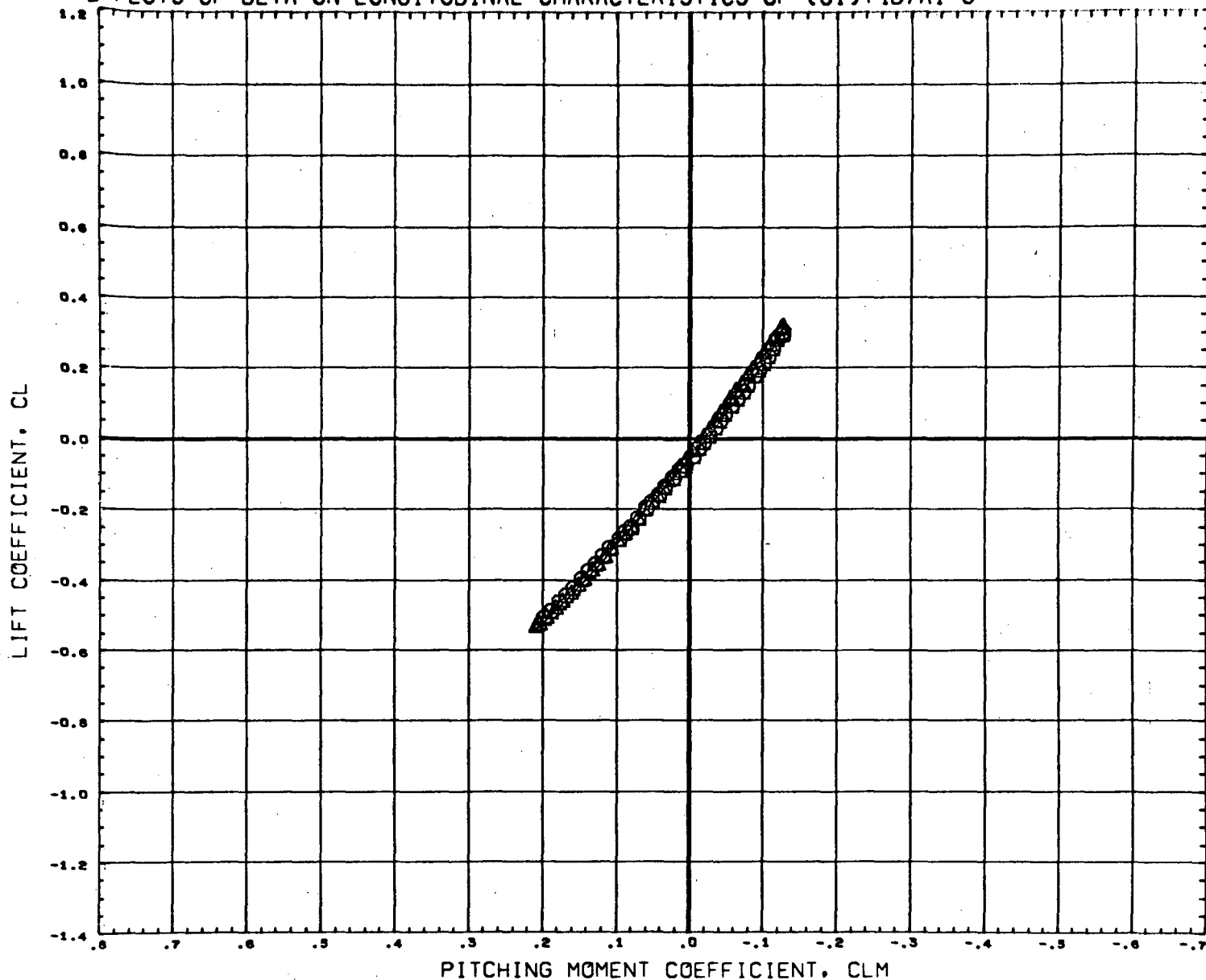


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |



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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5



DATA SET SYMBOL CONFIGURATION DESCRIPTION

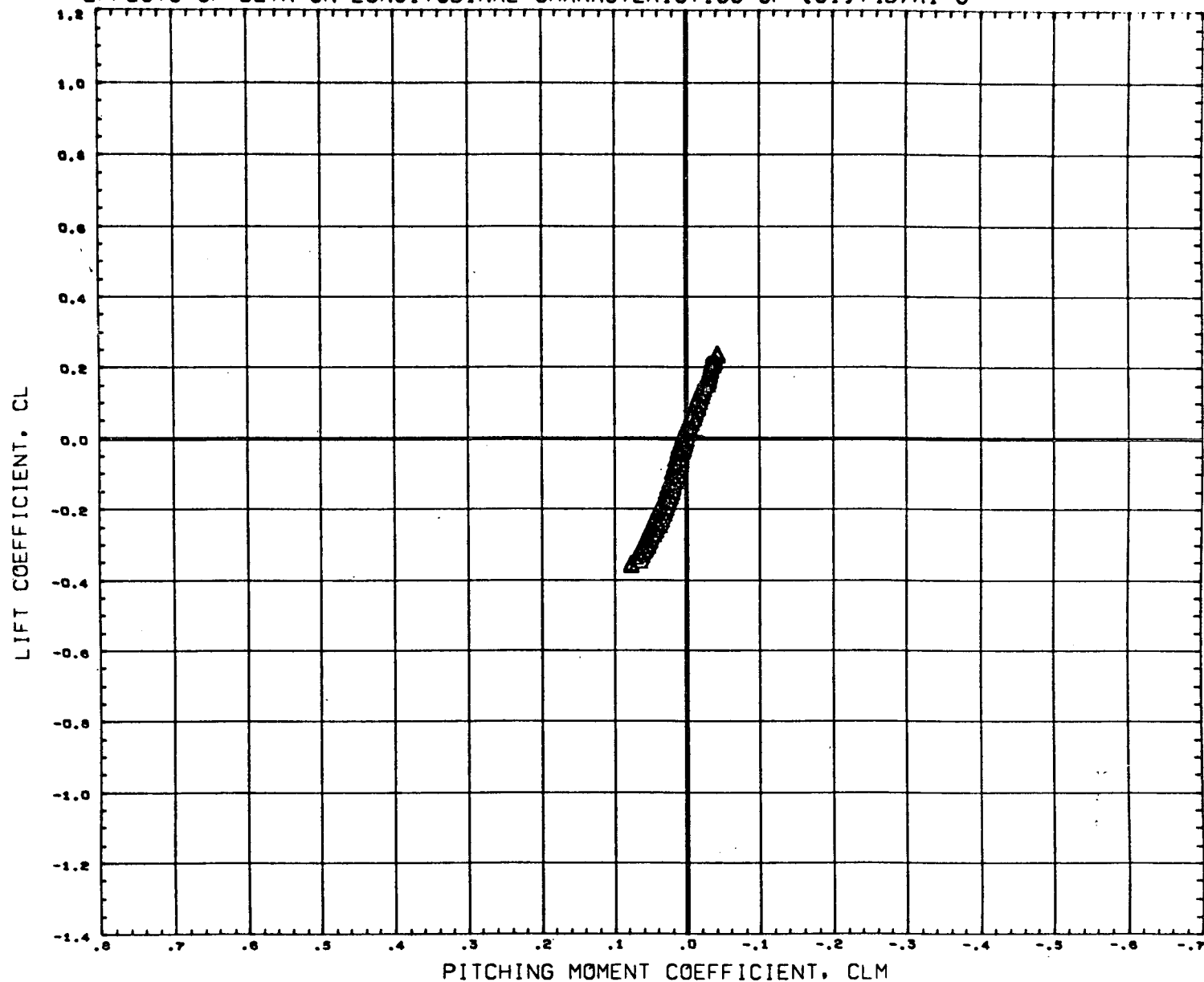
(CD74E4)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5
 (CD74E6)  MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 337.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 2.20

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EFFECTS OF BETA ON LONGITUDINAL CHARACTERISTICS OF (01)T4B7A1-5

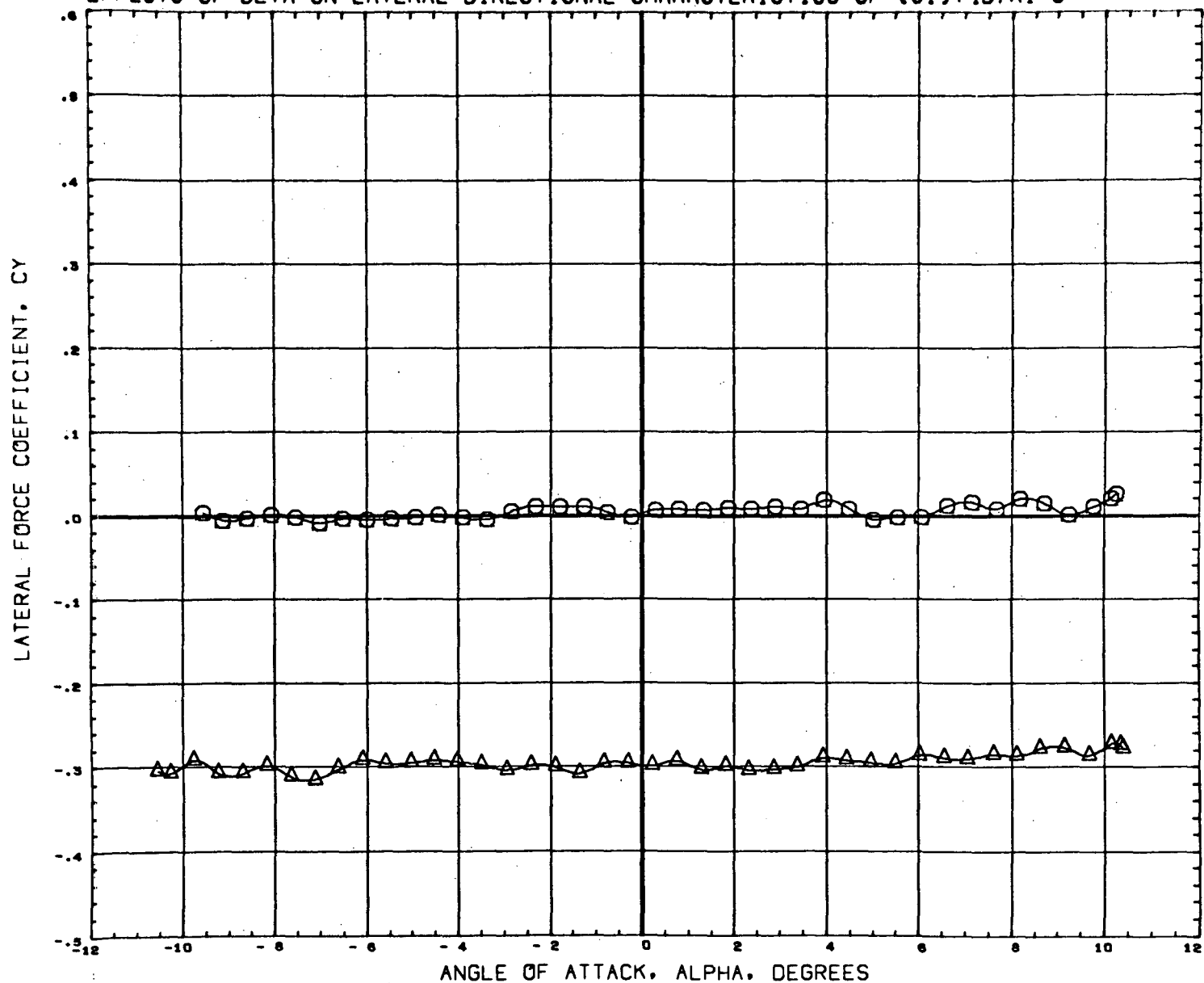


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (CD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (CD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XM RP | 557.0004 IN. |
| | | | | | | YM RP | 0.0000 IN. |
| | | | | | | ZM RP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 4.47

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (01)T4B7A1-5



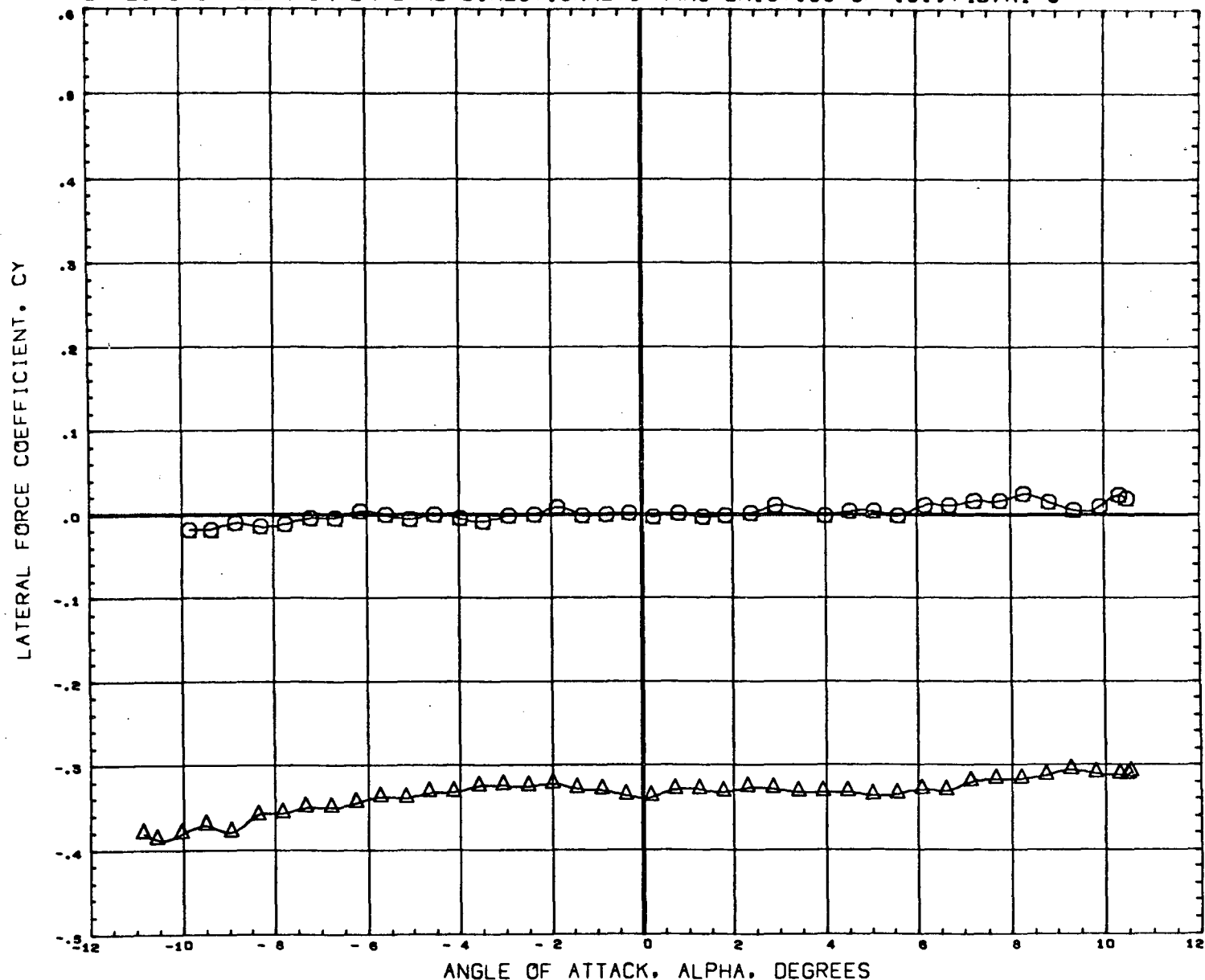
DATA SET SYMBOL CONFIGURATION DESCRIPTION
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 (TD74E6) △ MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.3004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (O1)T4B7A1-5

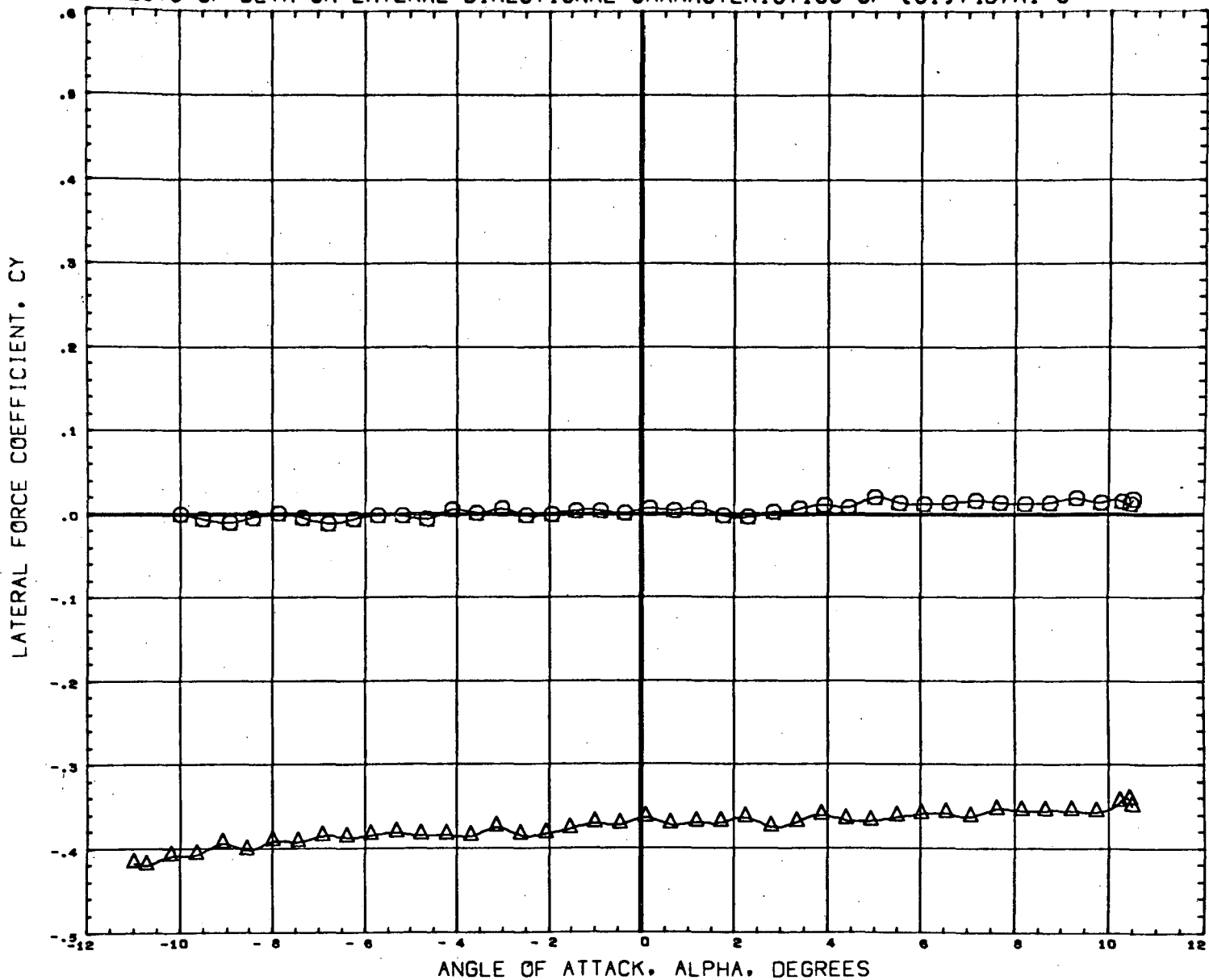


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74E4) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (TD74E6) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 537.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .90

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (01)T4B7A1-5



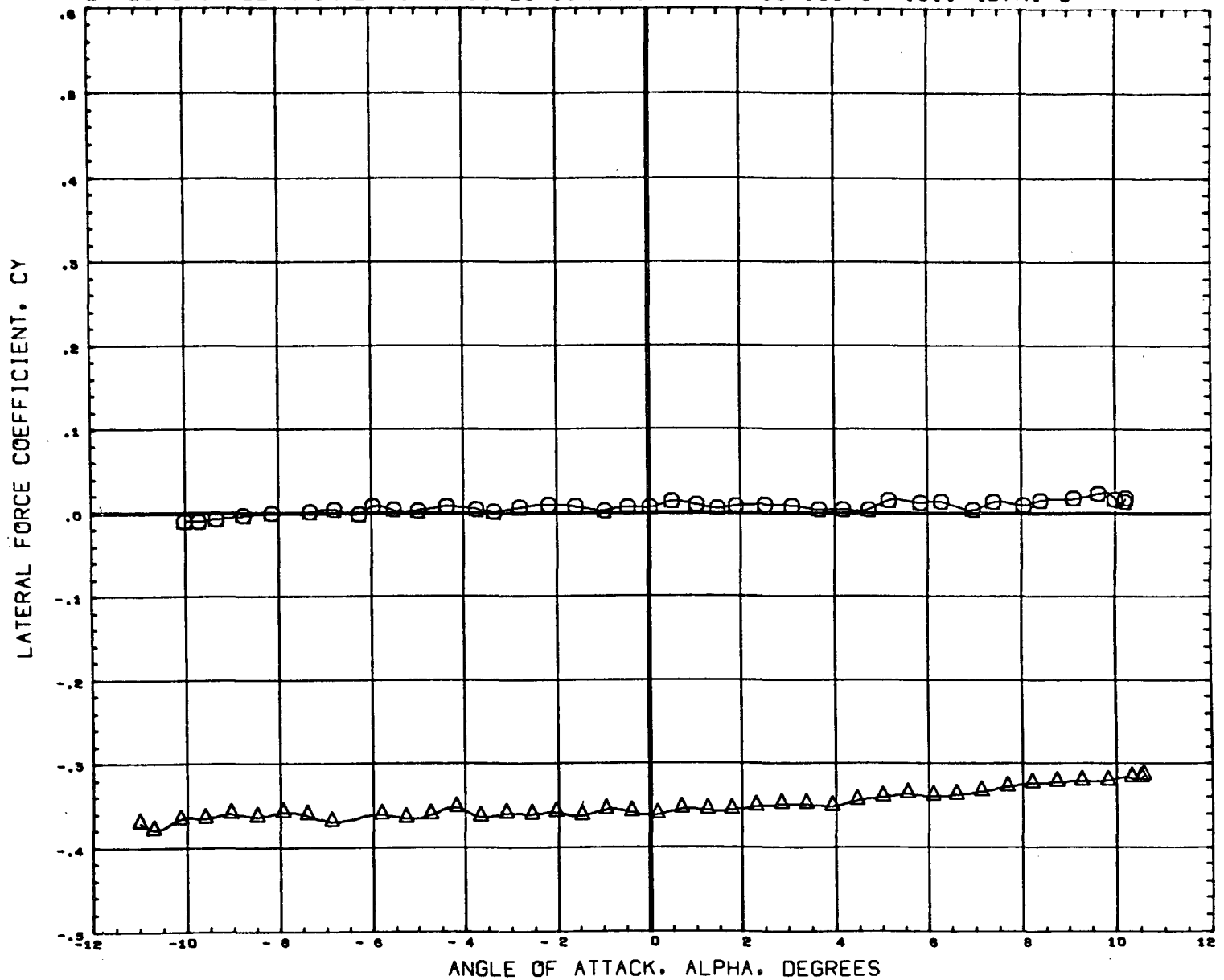
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (RD74E4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 |
| (TD74E6) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION |
|-------|--------|--------|--------|-----------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF 609.5004 IN. |
| | | | | BREF 882.0004 IN. |
| | | | | XMRP 557.0004 IN. |
| | | | | YMRP 0.0000 IN. |
| | | | | ZMRP 200.0004 IN. |
| | | | | SCALE 0.0060 SCALE |

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (01)T4B7A1-5



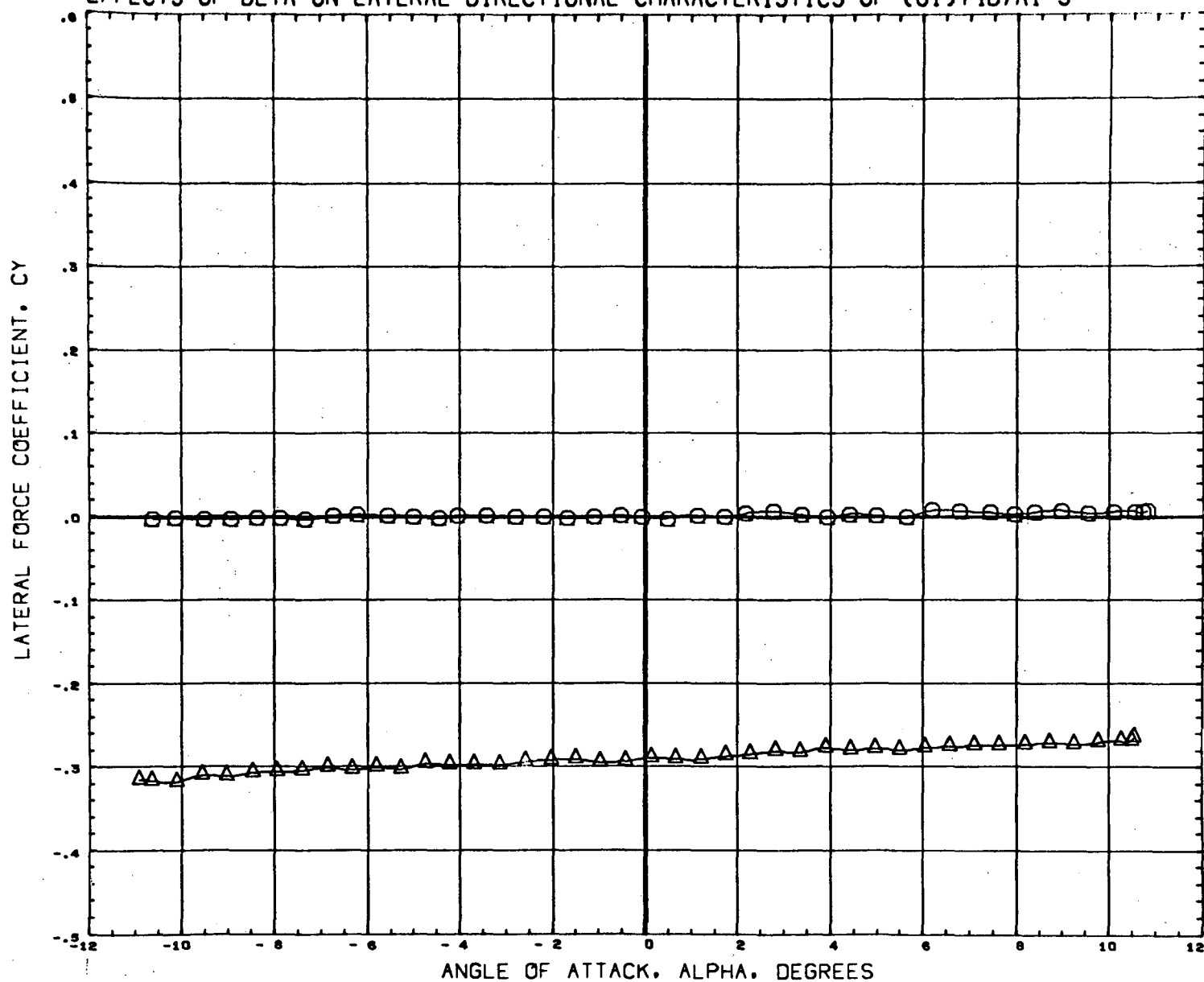
DATA SET SYMBOL CONFIGURATION DESCRIPTION
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 (TD74E6) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5



| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (01)T4B7A1-5



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (RD74E4)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5
 (TD74E6)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

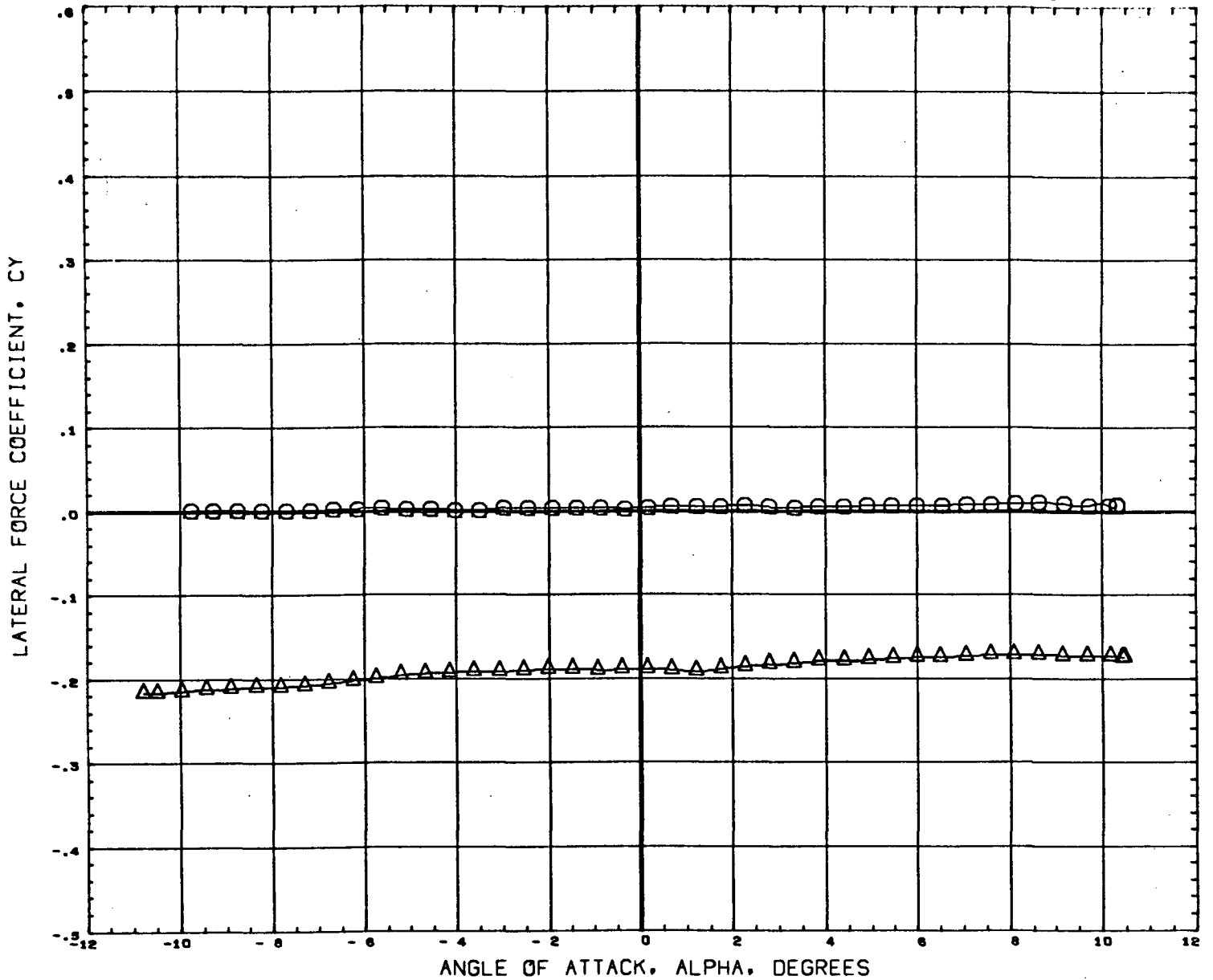
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 882.0004 | IN. |
| XMRP | 537.0004 | IN. |
| YMRP | 0.0000 | IN. |
| ZMRP | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH

2.20

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (01)T4B7A1-5



DATA SET SYMBOL CONFIGURATION DESCRIPTION

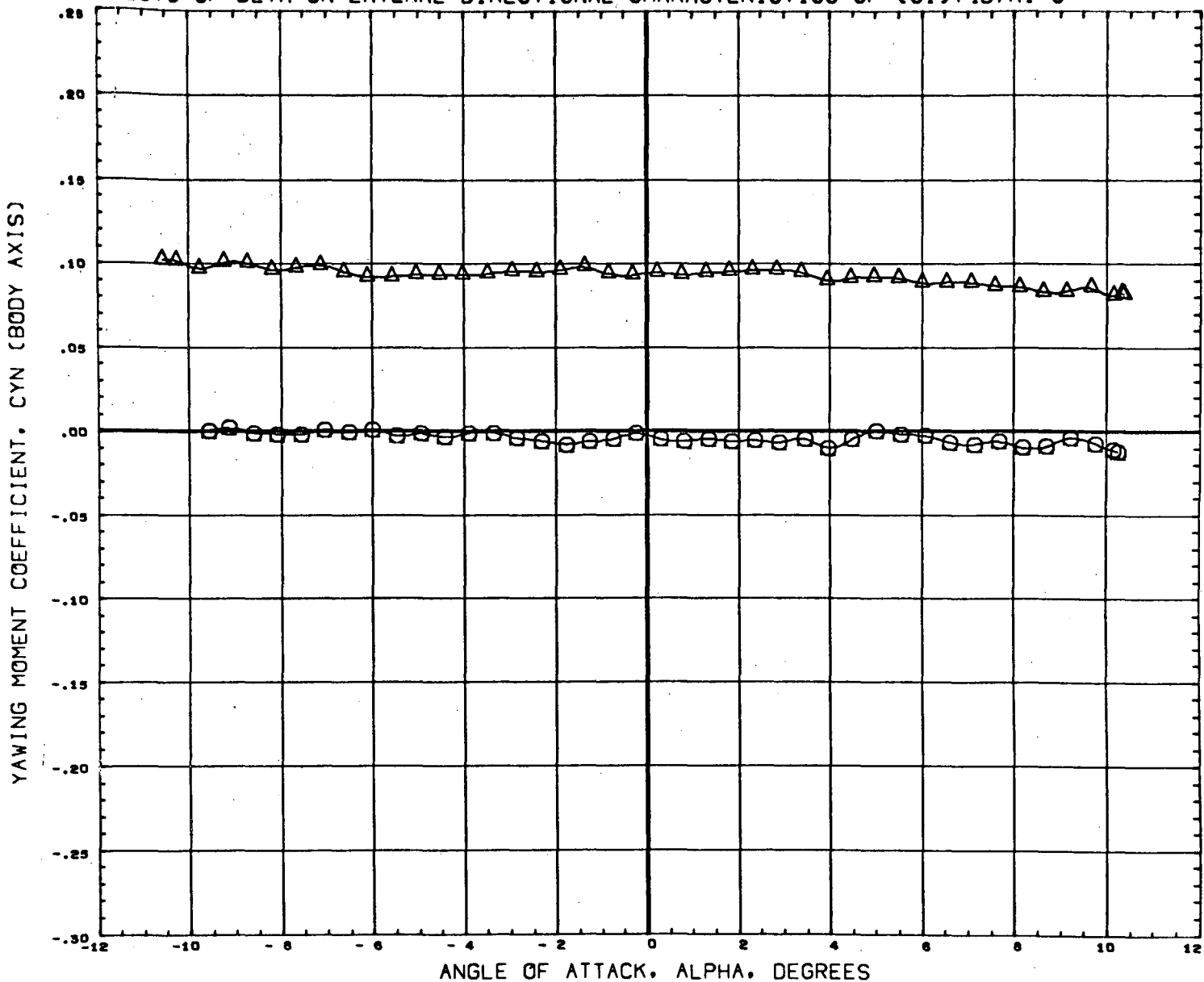
(RD74E4) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5
 (TD74E6) MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 0.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 4.47

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (01)T4B7A1-5

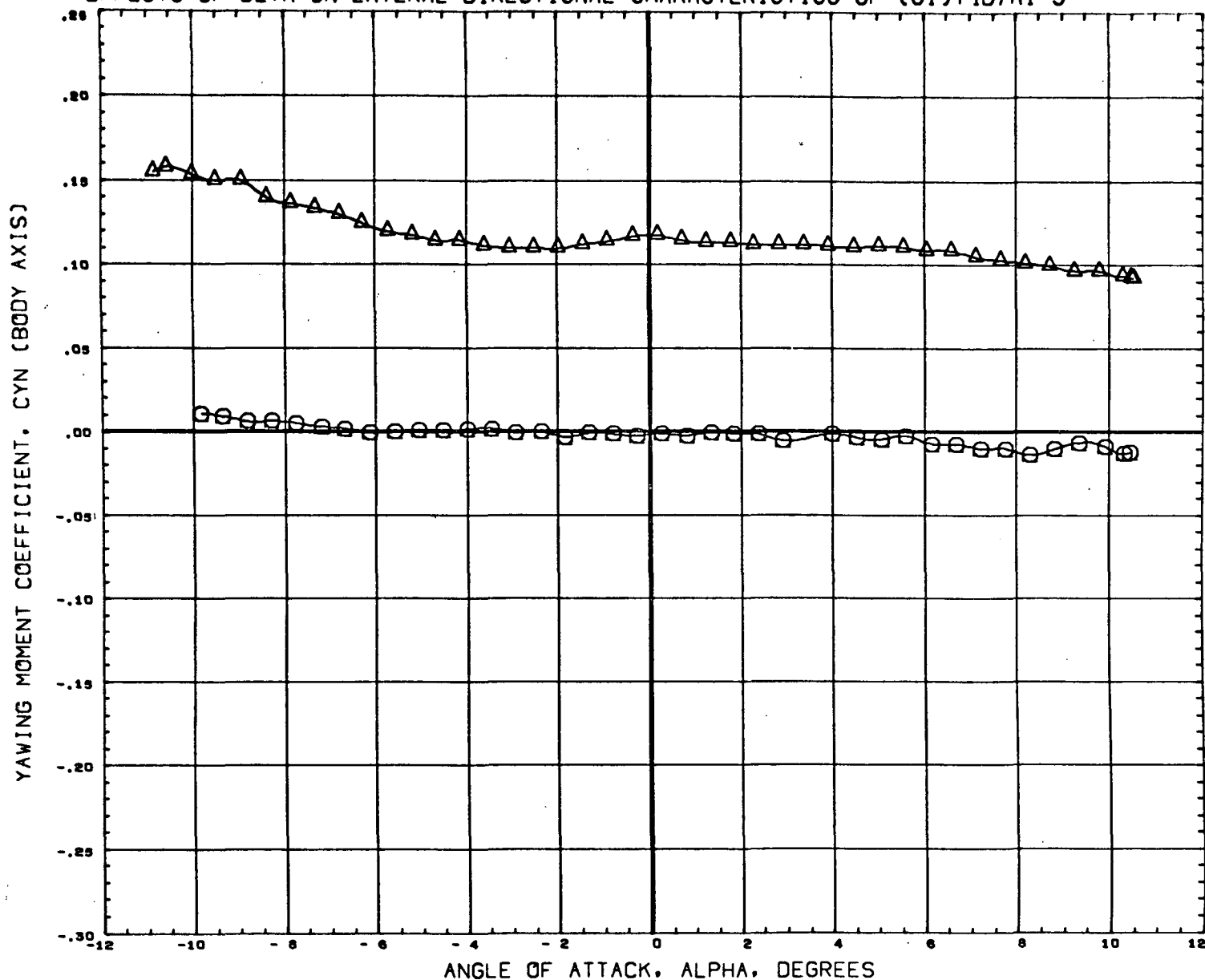


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (TD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.3004 IN. |
| | | | | | | BREF | 682.0004 IN. |
| | | | | | | YMRP | 957.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (01)T4B7A1-5

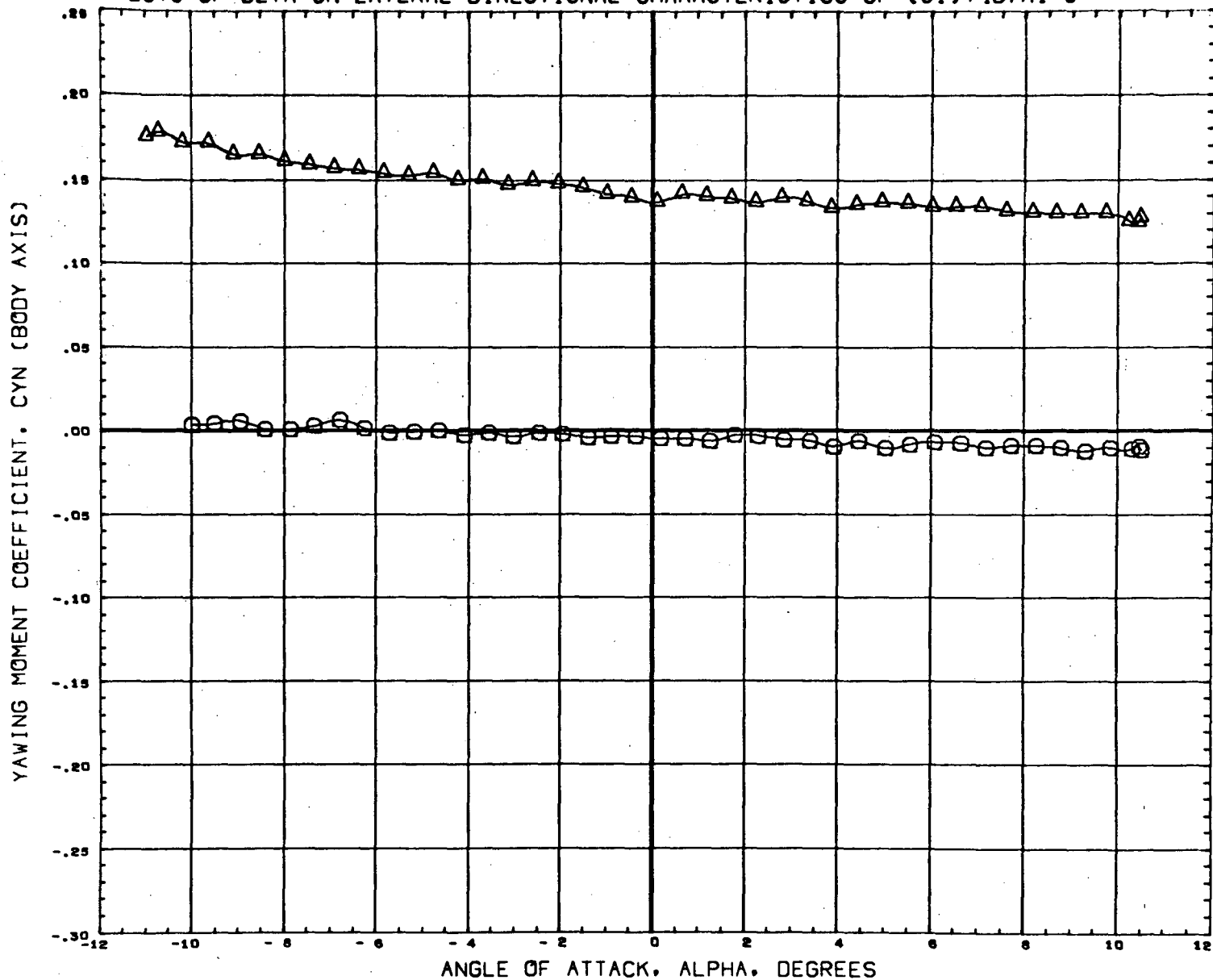


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74E4) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (TD74E6) | MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (01)T4B7A1-5

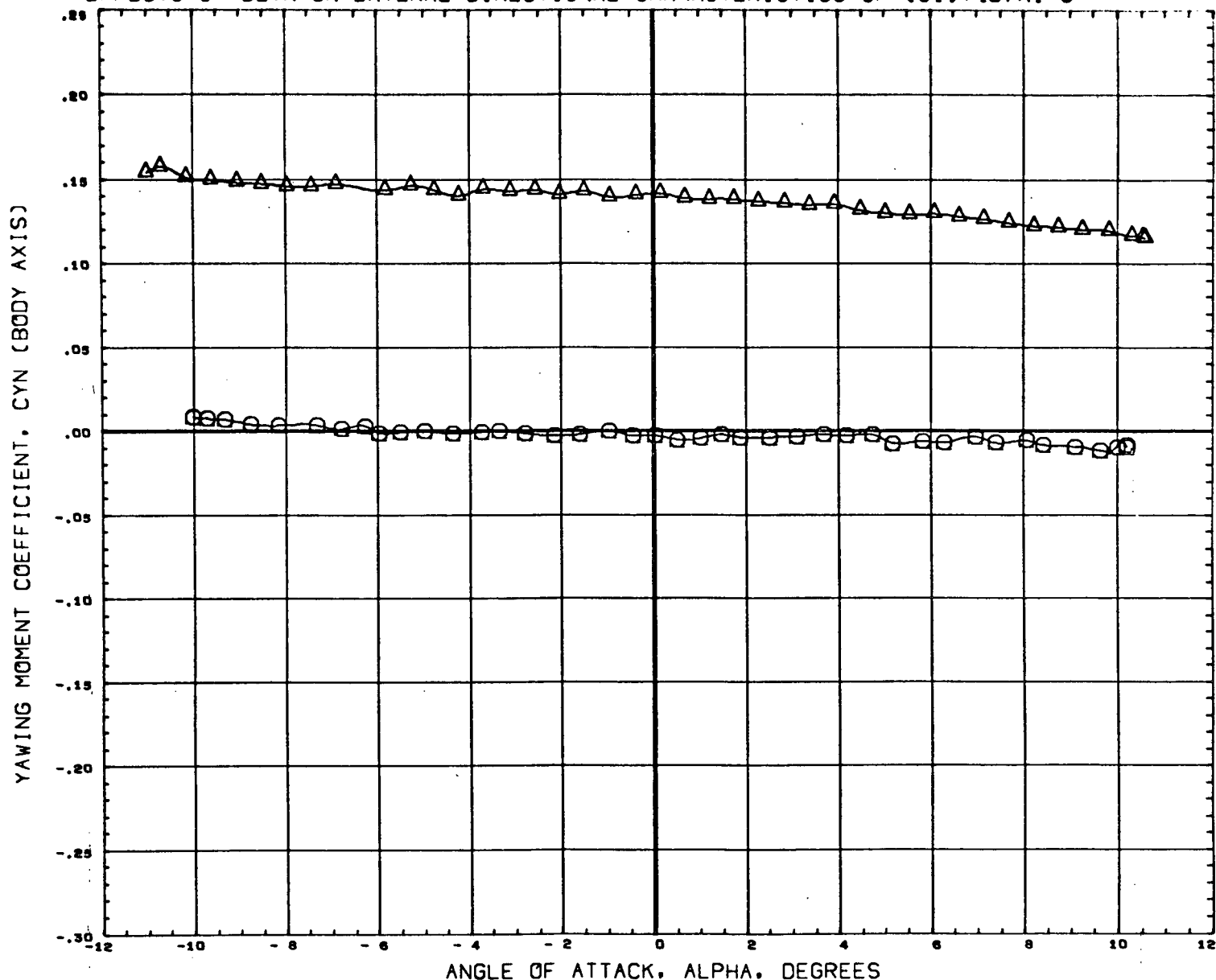


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74E4) | NDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (TD74E6) | NDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH 1.09

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (01)T4B7A1-5



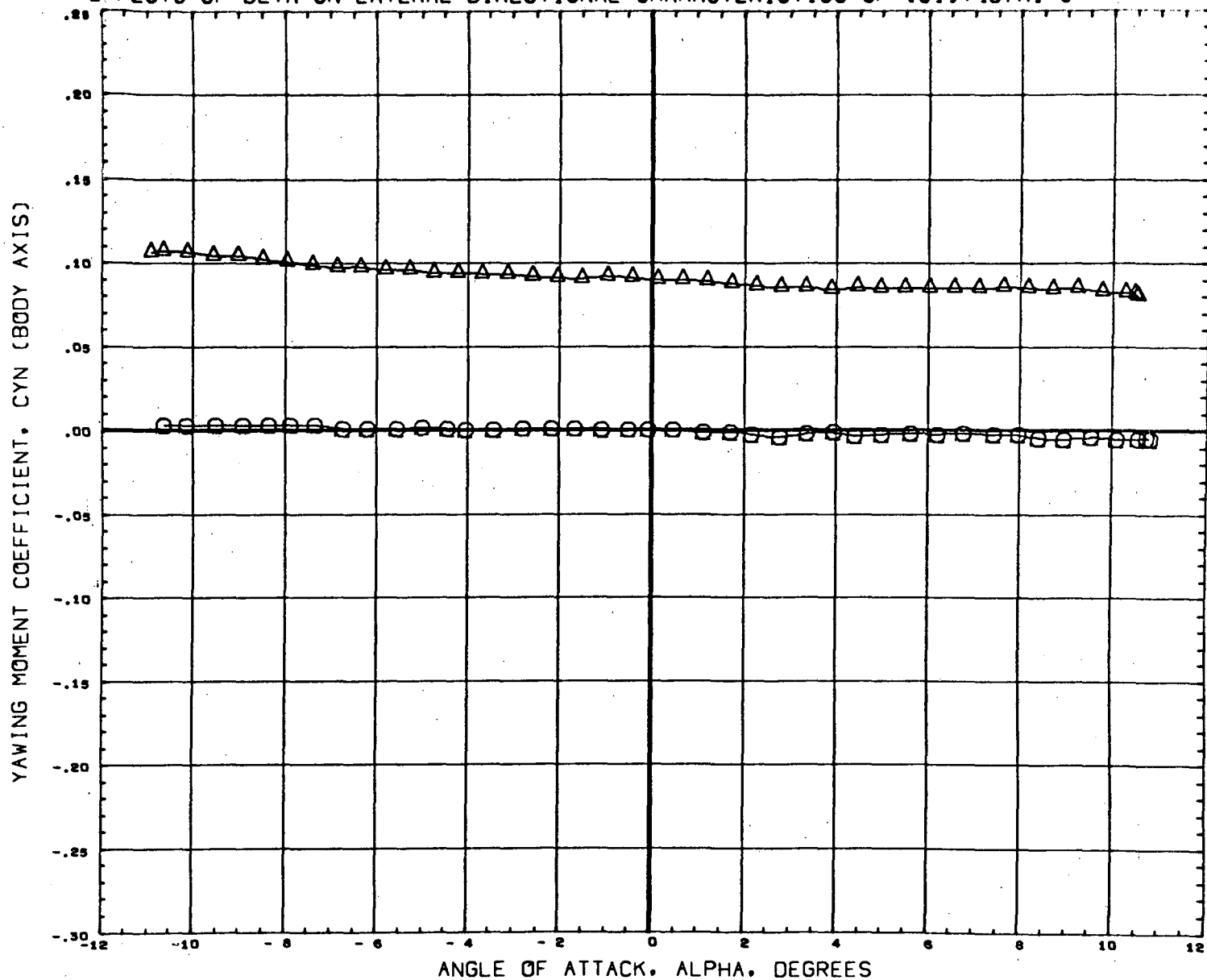
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|---|
| (RD74E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 |
| (TD74E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 1.51

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (01)T4B7A1-5

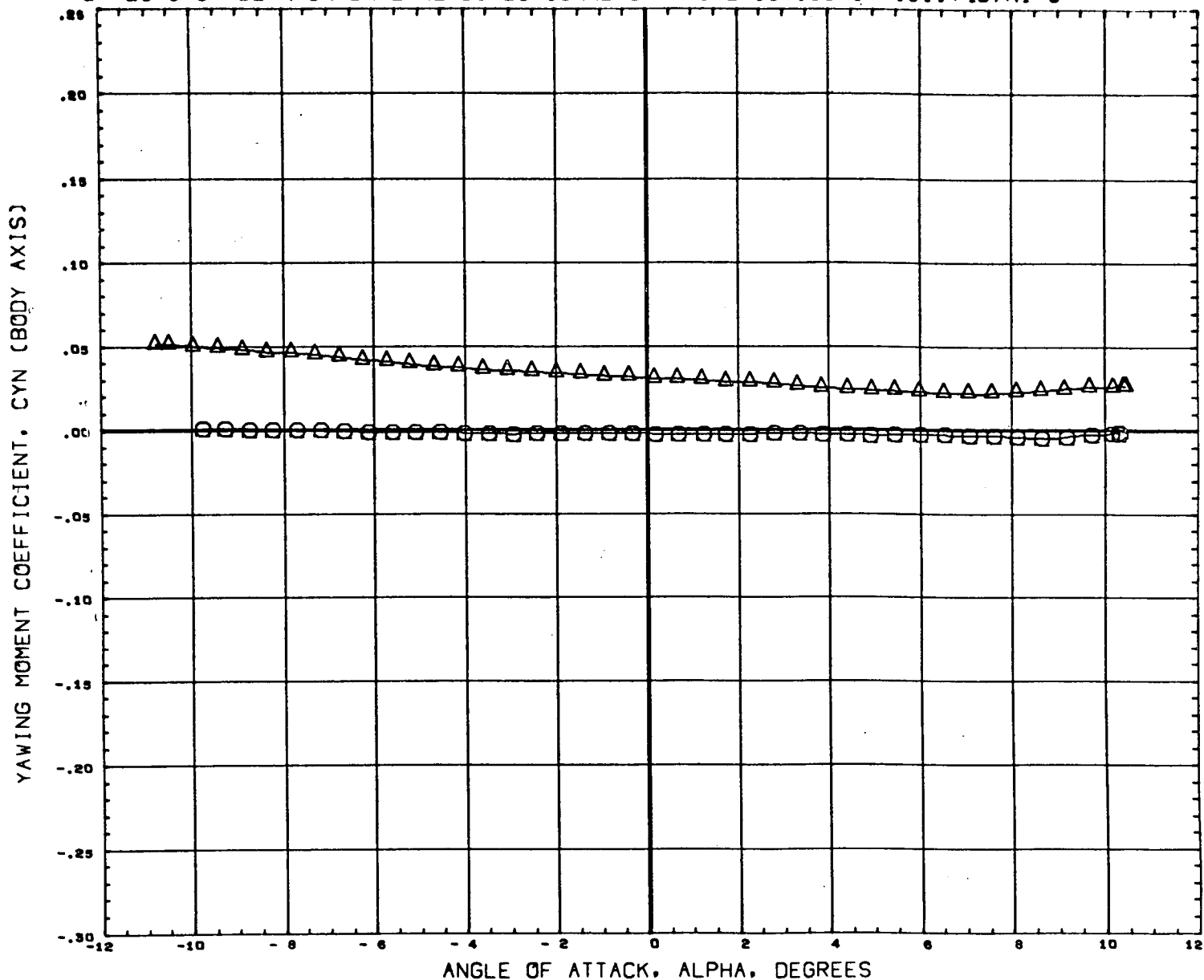


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (R074E4) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (T074E6) | MDAC S-222 COMPOSITE(T-CG) (01)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (O1)T4B7A1-5



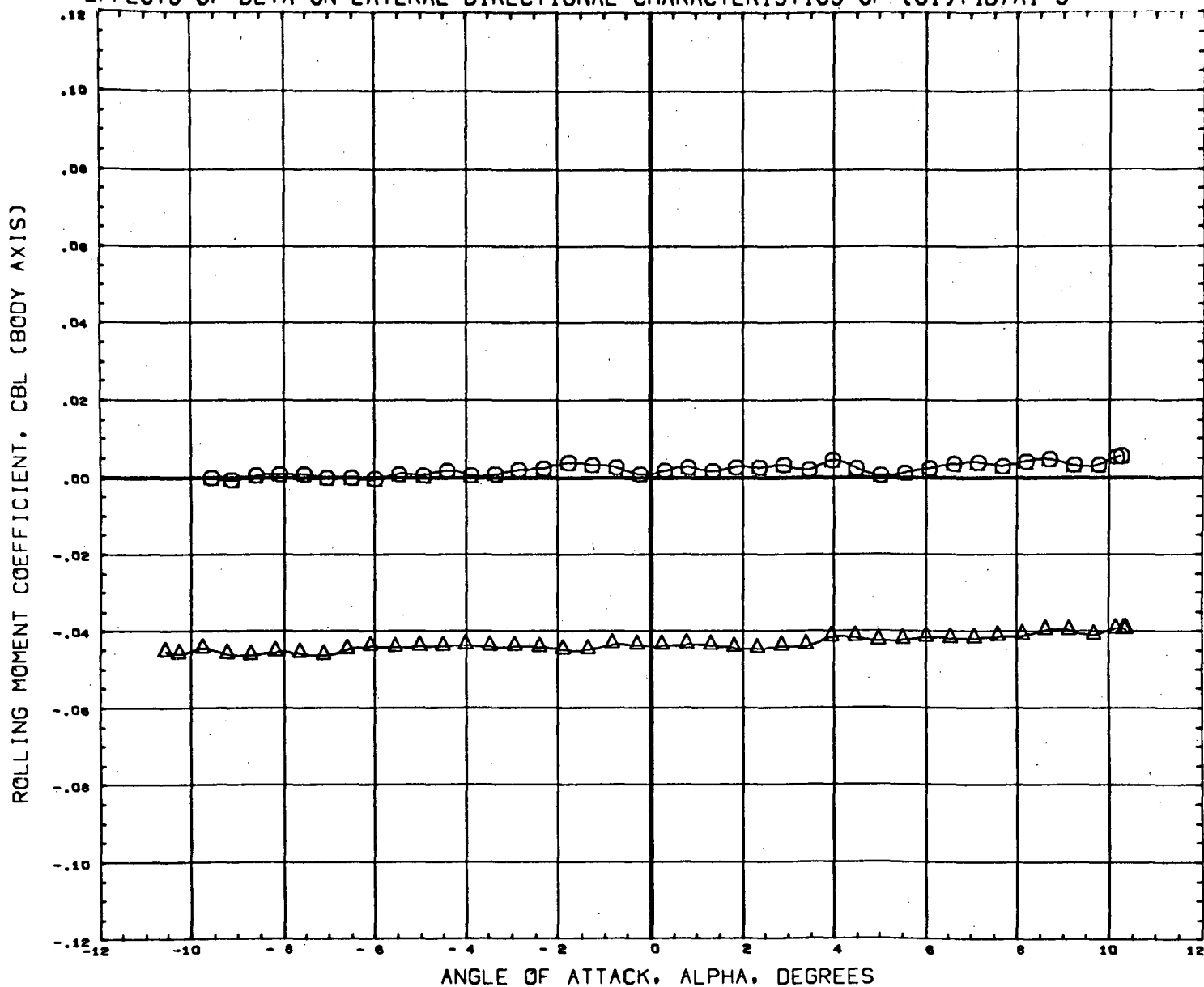
DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (RD74E4) MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-5
 (TD74E6) MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-5

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.3004 IN. |
| | | | | BREF | 882.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 4.47

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (O1)T4B7A1-5

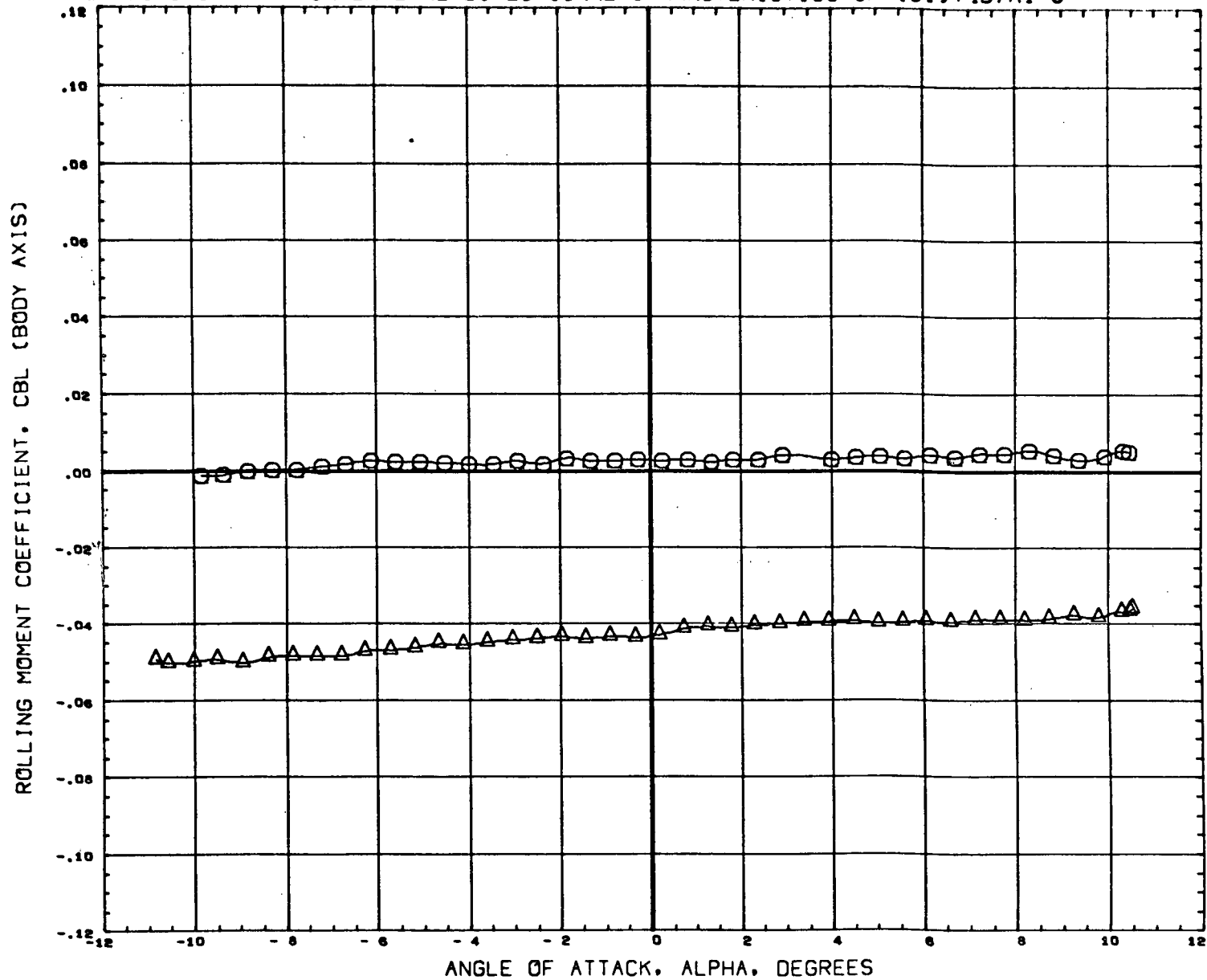


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|---|-------|--------|--------|--------|-----------------------|------------------|
| (RD74E4) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (TD74E6) | MDAC S-222 COMPOSITE(T-CG) (O1)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |

MACH .58

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (O1)T4B7A1-5

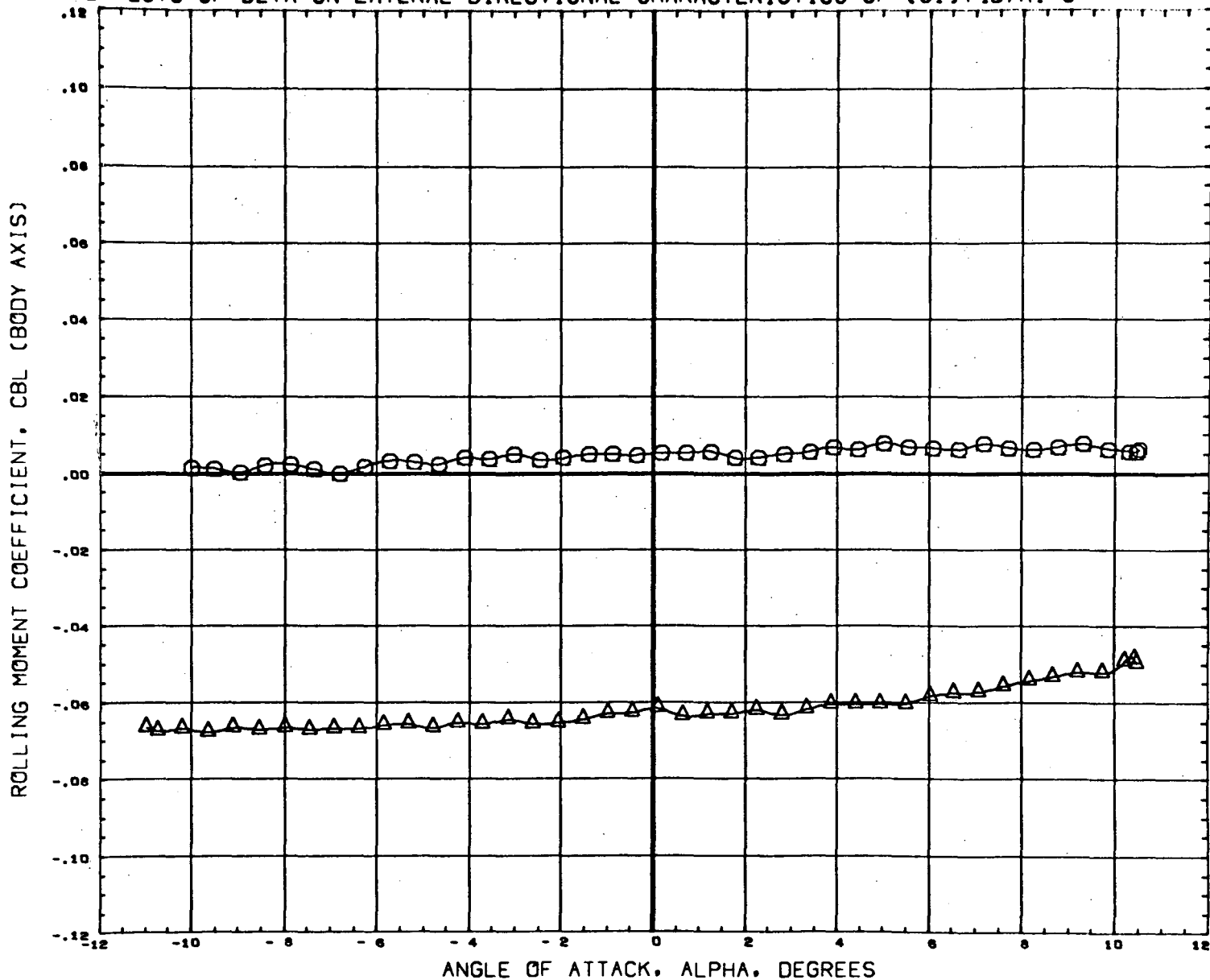


| DATA SET SYMBOL | CONFIGURATION DESCRIPTION | BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-----------------|--|-------|--------|--------|--------|-----------------------|------------------|
| (RD74E4) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-5 | 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| (TD74E6) | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-5 | 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | | | BREF | 882.0004 IN. |
| | | | | | | XMRP | 557.0004 IN. |
| | | | | | | YMRP | 0.0000 IN. |
| | | | | | | ZMRP | 200.0004 IN. |
| | | | | | | SCALE | 0.0060 SCALE |



MACH .90

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (01)T4B7A1-5



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(RD74E4)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5
 (TD74E6)  MDAC S-222 COMPOSITE (T-CG) (01)T4B7A1-5

| BETA | ELEVTR | AILRON | RUDDER |
|-------|--------|--------|--------|
| 0.000 | 0.000 | 0.000 | 0.000 |
| 6.000 | 0.000 | 0.000 | 0.000 |

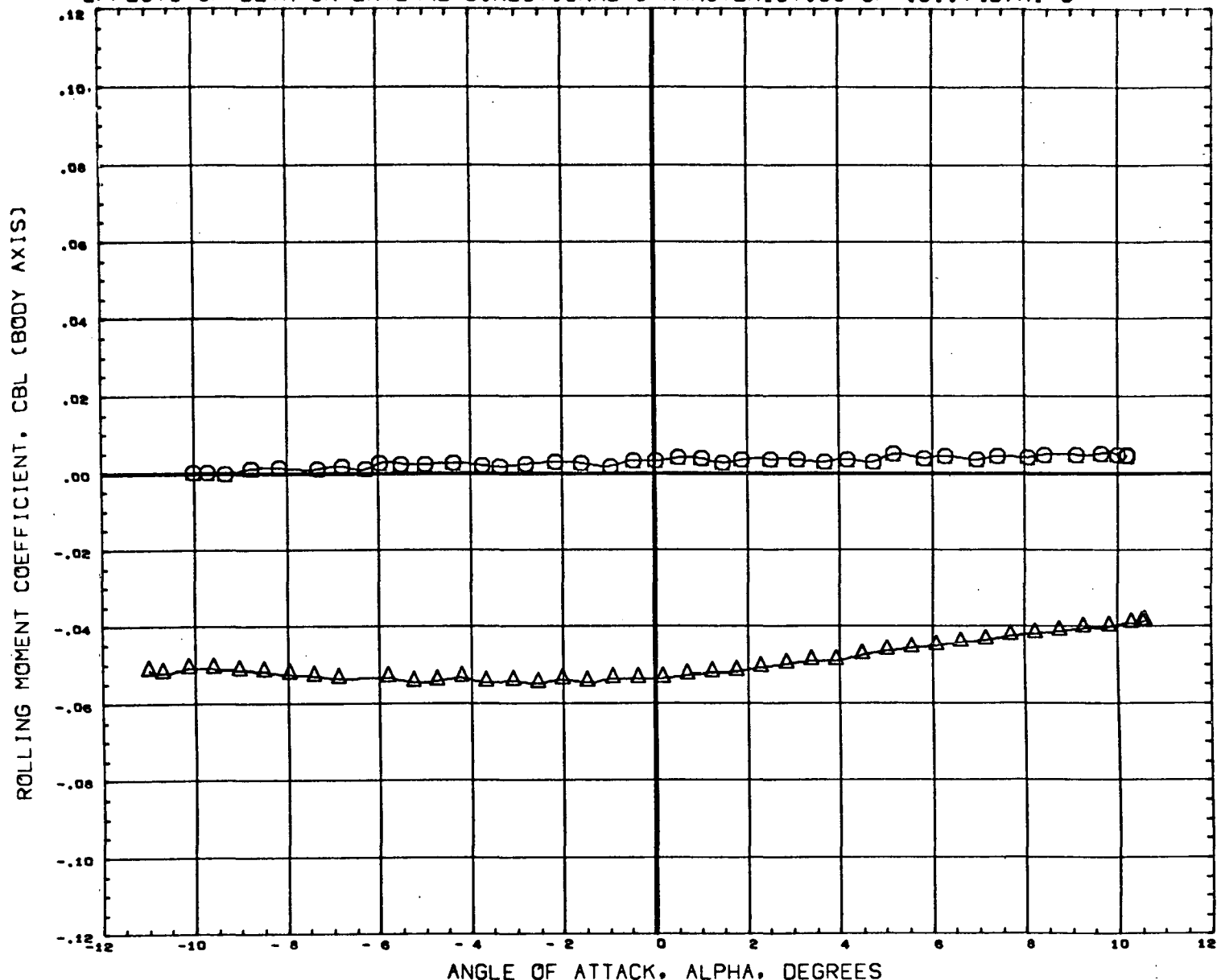
| REFERENCE INFORMATION | | |
|-----------------------|-----------|--------|
| SREF | 3155.3040 | SQ.FT. |
| LREF | 609.5004 | IN. |
| BREF | 862.0004 | IN. |
| XMRF | 557.0004 | IN. |
| YMRF | 0.0000 | IN. |
| ZMRF | 200.0004 | IN. |
| SCALE | 0.0060 | SCALE |

MACH

1.09

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (O1)T4B7A1-5



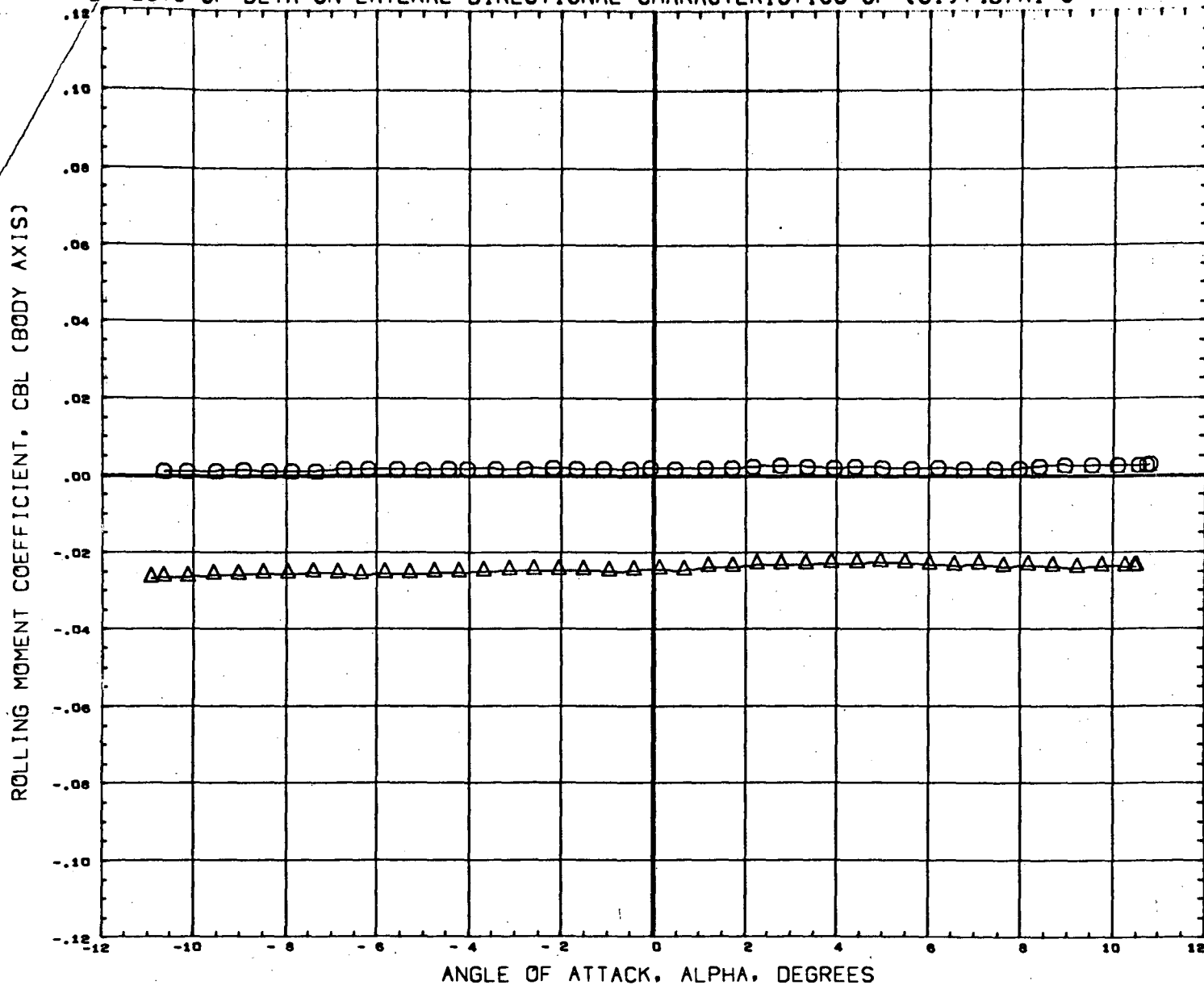
| DATA SET SYMBOL | CONFIGURATION DESCRIPTION |
|-----------------|--|
| (RD74E4) ○ | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-5 |
| (TD74E6) △ | MDAC S-222 COMPOSITE (T-CG) (O1)T4B7A1-5 |

| BETA | ELEVTR | AILRON | RUDDER | REFERENCE INFORMATION | |
|-------|--------|--------|--------|-----------------------|------------------|
| 0.000 | 0.000 | 0.000 | 0.000 | SREF | 3155.3040 SQ.FT. |
| 6.000 | 0.000 | 0.000 | 0.000 | LREF | 609.5004 IN. |
| | | | | BREF | 862.0004 IN. |
| | | | | XMRP | 557.0004 IN. |
| | | | | YMRP | 0.0000 IN. |
| | | | | ZMRP | 200.0004 IN. |
| | | | | SCALE | 0.0060 SCALE |

MACH 1.51

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (01)T4B7A1-5



DATA SET SYMBOL CONFIGURATION DESCRIPTION

(RD74E4) (01)T4B7A1-5
(TD74E6) (01)T4B7A1-5

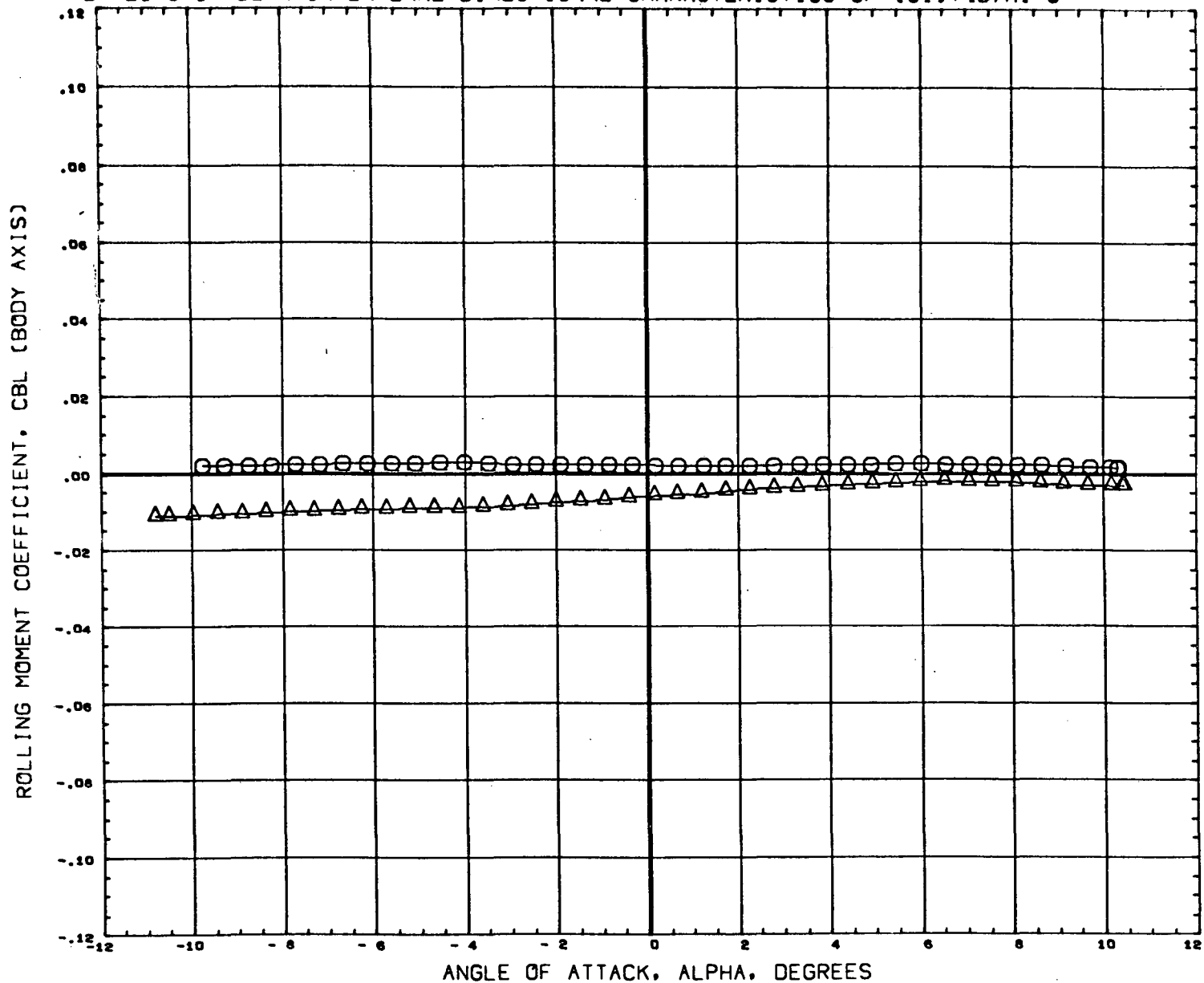
BETA ELEVTR AILRON RUDDER
0.000 0.000 0.000 0.000
6.000 0.000 0.000 0.000

REFERENCE INFORMATION
SREF 3155.3040 SQ.FT.
LREF 609.5004 IN.
BREF 882.0004 IN.
XMRP 557.0004 IN.
YMRP 0.0000 IN.
ZMRP 200.0004 IN.
SCALE 0.0060 SCALE

MACH 2.20

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EFFECTS OF BETA ON LATERAL-DIRECTIONAL CHARACTERISTICS OF (O1)T4B7A1-5



DATA SET SYMBOL CONFIGURATION DESCRIPTION
 (RD74E4) (O1) T4B7A1-5
 (TD74E6) (O1) T4B7A1-5

BETA ELEVTR AILRON RUDDER
 0.000 0.000 0.000 0.000
 6.000 0.000 0.000 0.000

REFERENCE INFORMATION
 SREF 3155.3040 SQ.FT.
 LREF 609.5004 IN.
 BREF 882.0004 IN.
 XMRP 557.0004 IN.
 YMRP 0.0000 IN.
 ZMRP 200.0004 IN.
 SCALE 0.0060 SCALE

MACH 4.47

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